EDUCATIONAL SCREEN

The Magazine Devoted Exclusively to the Visual Idea in Education

FEBRUARY, 1938 ● VOLUME XVII, NUMBER 2

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Student Camera Crew Makes a "Scoop"

Lantern Slides of Cellophane

The Ocean Comes to the School

Winter Slopes

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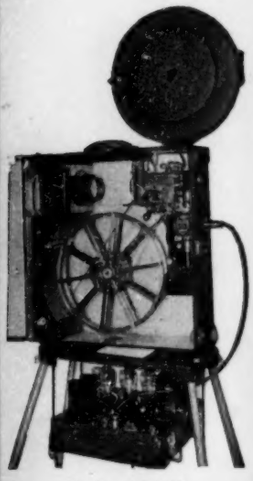

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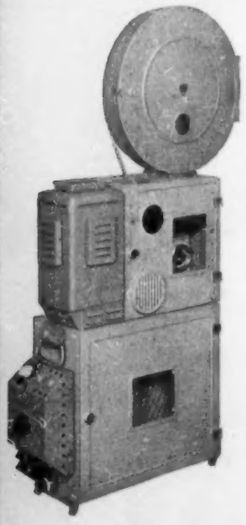

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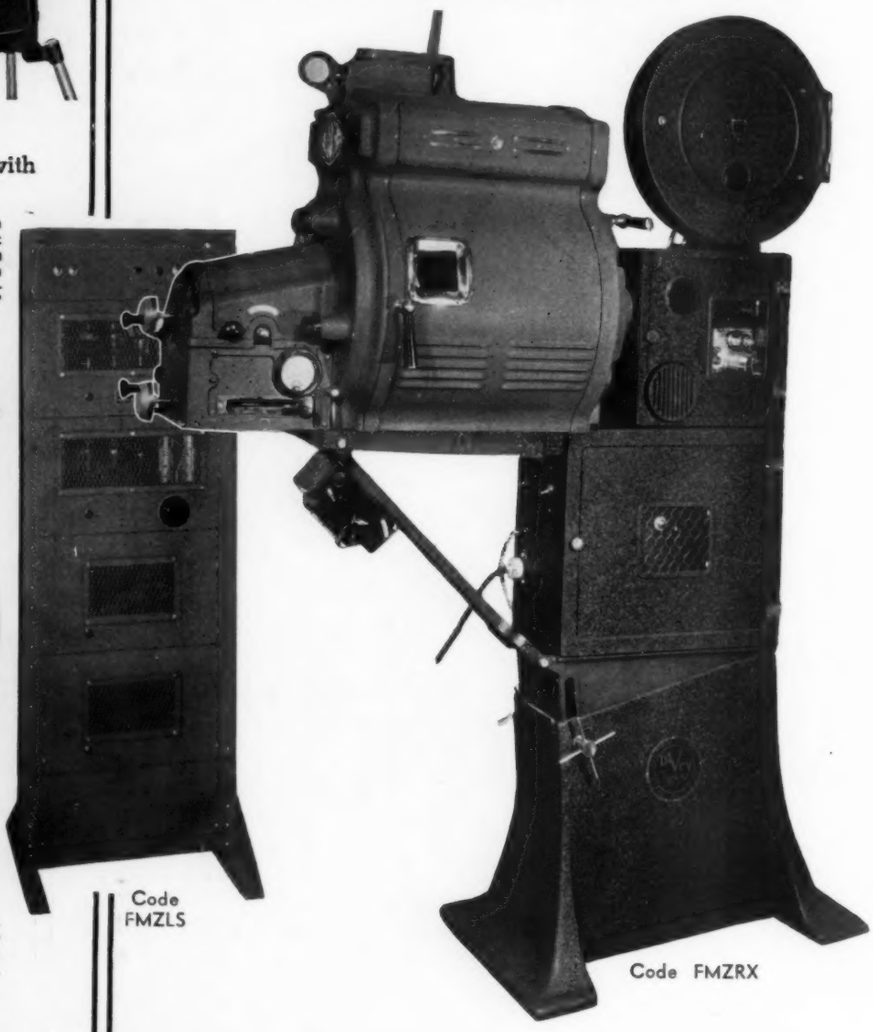

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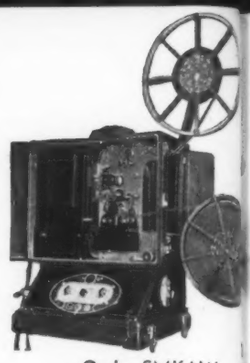

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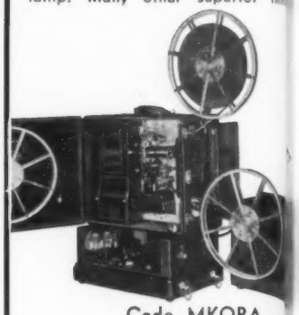

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The EDUCATIONAL SCREEN

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Audio Aids In A Visual Program

Visual aids can be supplemented by many audio devices, most of which are used by the large modern High School.

By ARNOLD P. HEFLIN
Director of Visual Education, Lane Technical High School, Chicago.

EDUCATION as a whole tends to lag behind industry in availing itself of technical advances in equipment. Nowhere is this more evident than in the field of visual aids, and more especially in connection with the audio devices which have been developed to accompany the visual aid, such as the sound-on-film motion picture. The automobile industry, one of the most progressive in the country, now presents practically all of its film with sound. It does this not only in the field of direct selling and propaganda, but also in its teaching films to be used in its sales departments. Now as sound film is much more expensive to produce, there must be good business reasons for using it; and if there are, educators must consider these reasons also, and not accept too readily the dictum of those who say that the sound film is not as well adapted to instructional purposes as the silent film. Other audio aids, such as public address systems, power amplifiers, and various devices operating in conjunction with phonograph records of various types, are common adjuncts of many types of business today. They are used in connection with radio, with still film projectors, with photographs, charts and diagrams, and also with actual exhibits of products. If it pays business to use these devices, it will also pay the country in the long run to use these devices, in proper form and degree, in education.

Inertia has much to do with the supremacy of the book in the classroom. It is supreme there, and will probably remain so; but it is no longer the absolute monarch it once was. As the cost of devices to aid the teacher becomes lower, and as more and more practical devices are being developed commercially, we find the heavy bookish atmosphere of the old style classroom dispelled by the laboratory atmosphere, where teacher and pupil learn together by seeing, hearing, and doing things. Charts, pictures, slides, films, records—all these are a part of the scene; and the more they are home-made by the pupil himself, the greater the interest and the value they have to the pupil. Life today moves at a faster tempo than it did in the youth of many of our teachers; and by keeping up with it, we shall find our pupils loath to leave our classrooms rather than loath to enter them. And while most of my readers will agree as to the value of visual aids in such a program, many will not be familiar with the benefits to be derived from audio aids used in connection with a visual program. Inasmuch as we are both using and experimenting with such audio aids in our school, an account of our experiences may prove of interest.

Although it is quite freely admitted,—more especially by those connected with the smaller school—that the large high school "cannot hope to do as good work as the smaller school" it is a fact that our high school of over 8000 pupils is far less handicapped in the matter of visual and audio aids than the smaller school. This is primarily because we are able to finance our work to a large extent in the school itself. Being a technical school, our faculty and student body are interested in mechanical things, and the audio-visual program is well supported by them. Monthly showings of sound films are given after school hours, with music and stunts by various student organizations. An admission of five cents is charged, and with the attendance running from one thousand to three thousand we are able to purchase many items, such as filmslide projectors, filmslides, records, amplifiers, microphones, lighting equipment, motion picture negative, motion picture cameras and sound projectors. These items are not furnished by the board of education, and would not be available to us if we could not purchase them ourselves. We are able to do this, and also help out in the financial needs of other clubs and organizations in the school not having the opportunity which we have for making money. Interest in the work is growing among the teachers, several of whom are at present at work on scripts for teaching films of their own, which will be produced and financed by the audio-visual organization, and directed by the teacher.

The growth of the use of visual aids in the school has been greatly increased in the last two years, as is shown by the increase in the number of films ordered from the central visual education department maintained by the city Board of Education. The use of stereopticon slides furnished by the board is also increasing, but not at the same rate as the use of films. We are not at the top of the list as far as the number of films used goes. Over a representative period, we find the number of films used per thousand pupils in the Harrison High School was 65; in Crane Technical High School 31, and in Lane Technical 28. However we hope by efficient showing of the films to increase the number of pupils seeing the film, with the idea in mind that anything worth showing to one class in a department should be shown to all, and that any film not good enough to be shown to a whole department should not be shown by individual teachers. This is not a rule of the school, and is open to exceptions; but we believe it tends to discourage the showing of films in classrooms as a mere pastime.

During a typical week, we shall receive from the board on Monday, 20 sets of slides, 6 sound films, and 31 silent films. These will be retained for one week, and be returned on the following Monday. A complete list of these aids will be issued in the teacher's bulletin during the preceding week, so that all may know what material will be available. While many of the films

have been ordered by individual teachers, large group showings enable us to cover a whole department in one day; after which the film may be used by other departments, classes, or clubs if they wish. We may state parenthetically here that we also obtain film from various rental services at times, all our "entertainment film" for after-school sessions being obtained in this way. Since film must be ordered a semester in advance, it sometimes happens that a teacher will need a certain type of film which is not available on the week it is wanted. Hence the rentals.

After the purchase of our 16mm. portable sound projector, we found somewhat to our surprise that it was equally valuable in projecting silent pictures as it was in projecting sound pictures, especially where larger groups were concerned. In our experience, an oral preface to the showing of any film is always desirable, and by the use of the microphone in connection with the sound system of the projector any size audience can be reached easily with a minimum of effort on the part of the teacher. This was especially the case when showings were made in the auditorium, which seats over 2500; the percentage of attention was definitely higher when the amplifier was used. In the case of silent films, accompanying comment could now be made through the microphone by any teacher, no matter how small his voice, with the assurance that every pupil in the room could hear what was being said.

An experimental showing of the picture "Sign of the Cross" was an early project in the use of the sound projector. It was believed that there was much material of educational value in this picture, which was historically accurate in practically all details. In showing it, we felt we were coming close to taking the student back 2000 years in time and across 3000 miles of space, so that he might see what the dress, customs, and life of the ancient Romans were really like. However such a strong attitude has been built up connecting sound pictures with theatrical entertainment, that teachers and pupils alike were more interested in the story than in the scenes considered as educational material, despite our efforts to obtain a new attitude on their part. Since the picture as we showed it consisted of three 1600 foot reels, each one showing for one period, it was necessary to show one reel all day, the second reel the next day, and the third reel the final day. This plan, making a serial of the picture, was objected to by some teachers, on the ground that the interruptions occurred at the most thrilling parts of the story. We plan to use the film again, this time not showing it to the general study hall, but to special groups, as Latin, History, English. We will show only selected parts in which the group viewing the picture are most interested, and we shall have the sound cut off (by removing the exciter lamp) and comments on the film made by a teacher qualified to do so, bringing out the things which are of importance to the group comprising the audience. For some groups, and for certain scenes, it may be decided to use the sound track. That such a presentation involves much more thought and planning than a mere showing of the picture is obvious.

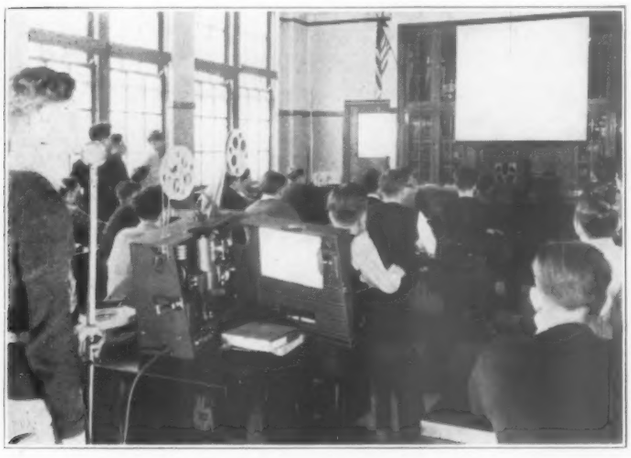
We believe many critics of the sound film are also theatre minded, and forget the ease with which the sound may be dispensed with, thus making the film silent. If sound is to be used, the preparation of the lesson will be more difficult, but the results obtained will be better. Utilizing the eye-gate plus the ear-gate *at the same time* seems to give a result decidedly greater than either one used alone. Just how much greater the effect is depends upon the individual, and the question may be thrown to the psychologists. We are at present experimenting with the use of slides and films bearing on the same topic, using the film for the overview, and the slide for assimilative or discussion material. In some cases we are making both the film and the slide in our own school. We hope to have something interesting to report on such coordination when the work has been carried further.

In this connection we are often asked why we do not attempt to make sound film in our school. At the present time recording equipment is very expensive, very delicate in adjustment, and becomes obsolete rapidly. Cameras recording sound on the same negative as the picture are not satisfactory for our purposes, as the difficulty of cutting and editing the film are too great. This type of camera is seldom used in Hollywood at present. Sound should be recorded on a separate film, and then printed on the final negative after the scenes have been arranged in their proper sequence. This process, technically known as "dubbing" is expensive, and beyond the reach of the average school. The equipment to go with our Cine Special will cost in the neighborhood of $2500. Hence, if we should need to have sound put on any of our pictures, we should go to some laboratory making a specialty of this work, and pay their fee for it. Prices quoted on this work vary amazingly. In general they are too prohibitive for the budgets of most schools. It would apparently be cheaper for us to take a whole cast of characters to New York and pay their expenses at the best hotel for a week rather than have the work done at a local commercial laboratory.

Our senior class which was graduated in January, 1938, produced a motion picture entitled "Farewell to Lane" which was shown at the graduation exercises. Every boy in the class appeared on the screen, engaged in some favorite activity about the school. The student director of the picture, Kenneth Mansfield, wrote a narrative which he read in a microphone while the picture was showing. This was simpler, cheaper, and quicker to produce than the recorded sound track. This type of narrative is usually all that is needed for educational films, and we can recommend the plan as a practical solution which the average school can use. It would be easily possible to use two or more voices, and synchronization with lip movements is possible, but should usually be avoided, as it easily can be. We hope that some day sound recording devices will be simplified, and made more reasonable in price. When that time comes, we shall certainly avail ourselves of a sound track on most of our films. It provides a carefully planned, well synchronized, clearly enunciated lecture, no part of which can be omitted accidentally. The sound track never has a cold, it is instantly ready, it never loses its place. Its voice can be easily adjusted both for loudness and pitch to suit the largest

auditorium or the smallest classroom; and as has been said, it need not be used for every showing of the film. In our own work, after the first showing the teacher often turns off the sound and attempts to repeat the lecture, or, better still, give a deliberately modified version. Then ambitious members of the class will try to do a better job of it than the teacher did. The sound can be turned on at times for a brief bit of coaching. In this way, a personal interest is added, which enables the film to be shown over and over several times, without the feeling of monotony and boredom which accompany mere repetition. As our machine will project at both 16 and 24 frames per second, when students are lecturing on the film we usually project at the lower speed, to give them more time to think.

An interesting and amusing variation of this technique which we believe originated with us, is that in which the picture is removed from the screen by shutting off the projection lamp, and the sound is allowed to go on at somewhat reduced volume. A pupil tells the class what the picture would be if the light were on; and this is tested from time to time by the projectionists, who flashes the light on and off again. Both



Using the microphone before the showing of a sound film to a Physics class.

these procedures are well adapted to the socialized recitation, which is used extensively in many departments of our school.

Our Victor sound projector is equipped with a phonograph turntable which has two speeds, 78 r.p.m. for the ordinary record, and 33⅓ r.p.m. for the larger radio transcription discs, which play for 15 minutes on each side. We find this attachment most useful. In connection with showings of silent film there are many cases where phonograph records are very valuable. While a group of pupils are entering the room, a properly selected record will improve order and eliminate much of the noise and confusion often connected with this process. If no teacher comments are to be made with the picture, a soft and appropriate musical background seems to add interest to the showing. By using such selections as the Andante Cantabile by Tschaikowsky, or the Unfinished Symphony by Schubert, we believe we can do something toward improving the musical taste of our audience. Even though the attention is not primarily centered on the music, it becomes a part of the individual, and being good music, the more it is heard the more it is enjoyed. On occasion large groups use the assembly hall when it is not practicable to assemble the band or orchestra. A record of a good march speeds up the process of emptying the hall, and reduces talking and disorder. At social functions held by various clubs the equipment can provide not only a talking picture for entertainment, but also music for dancing.

We are experimenting at present with a recording machine which enables us to prepare our own phonograph records. Our experience with it in the field of visual education has been limited, as the largest record it produces is the ordinary 12 inch record. For satisfactory visual work, a machine capable of handling the 16 inch radio transcription disc should be used. One side of this disc will play for 15 minutes, or practically the same time as one 400 foot reel of 16mm. film. This makes an ideal combination for experimental purposes, and we hope to have such equipment available later. However our music department is using the present machine in training instrumental soloists and ensembles. It is found that the soloist who listens to himself on a record can have his faults pointed out to him much more forcibly, than while he is performing. Records are made of some of the outstanding performers of our National Championship Orchestra so that future members of the orchestra may be inspired to reach similar high levels of accomplishment. We are beginning the study of microphone placement and the effect of sound deadening material which is of intense interest to the modern youth with ideas of a radio career.

We have done some rather interesting things in connection with the large radio transcription discs. A large advertising organization in New York sent us a set of transcriptions giving 15 minute dramatized lives of great men of science. We have used these with considerable success as lectures in the classroom; but we hope to go further, and with the cooperation of our dramatic club, the stage crew, and some shop group of scenery construction, make a motion picture to accompany some of the best of these dramatizations. The time element is our worst hindrance here. Also through the courtesy and cooperation of the University of Chicago Broadcasting Council, we have obtained the use of some of their transcriptions of the Round Table discussions held every Sunday morning. Some of these discussions are of great interest to our Social Science classes, and provoke very interesting discussions in the classroom.

One audio aid which we are fortunate in possessing in the school is a public address system which enables us to broadcast into every room in the school. Radio programs, assembly programs, and addresses by the principal can be heard by every member of the school if desired. This equipment is quite distinct from the visual aid program. Few radio programs at the present time seem of sufficient value to justify incorporation into the crowded curriculum. The advent of television may change this situation, but progress of television in the schools is not apt to be rapid, as the expense of such devices will probably be high in proportion to the benefits derived.

In conclusion, it is our experience that the fascination which the microphone has for the youth of today should be utilized. If pupils can use the "mike," they like to speak; and they soon become conscious of the fact that a speaker must have something to say, and be careful how he says it. Classes pay better attention and learn more, because they can hear what is being said. Larger classes can be taught without the common phenomenon of finding all the good students in the front seats and all the poor ones in the rear. The class can be brought to order very quickly. Pupils like to become class chairmen so they may use the microphone. Schools may easily produce their own audio aids for a visual program, merely by purchasing a sound projector, which has a surprising way of paying for itself in a very short time. We are convinced that as more and more schools add the audio-element to visual instruction they will find it eminently worth while.

Student Camera Crew Makes A "Scoop"

A high school class supplements its visual aids with student-produced teaching films.

By ERNEST E. OERTEL, Ph.D.
Extension Division, University of California.

AMATEUR motion picture production in high schools is not new. Innumerable pictures have been made of football teams in action and of other school activities. Dramatizations have been filmed creditably, and commendable news reels have been made of the intra-mural life of some of the larger secondary schools of the country.

Now comes the instructional film, produced by teacher and students. By the instructional film is meant the motion picture which is designed to be used as a direct teaching aid in some special unit of study. Commercial producers of educational films have made available to teachers all over the country a great number of instructional pictures on many different subjects. But there are some fields which, naturally enough, they have not yet covered.

It was in such unexplored territory that the motion picture crew of the Eagle Rock (California) High School found it possible recently to score a "scoop" in the production of a highly serviceable educational film. The crew is made up of eleventh and twelfth grade boys who are members of a regular curricular Graphic Arts class. Their teacher and advisor is Miss Edith Frost.

A biology class in Eagle Rock High School, one of a group of selected high schools participating currently in a state-wide experiment in progressive education, wished to engage several months ago in a unit of study on date cultivation. Visual aids of the type desired were not available. Date culture is restricted to a small area in the Imperial Valley in California. Commercial producers of teaching films had not got around to making a film on this special subject to accompany the many excellent pictures they have made on other agricultural products.

The biology class did not wish to wait until a commercially-produced film could be made available. The class believed there was a unique and valuable study to be made on date cultivation and that that study, with the aid of the camera crew, could be made by themselves. It seemed appropriate that California students should make this particular study. They wanted to get some first-hand information about an interesting California product which is rapidly gaining importance economically. Perhaps, they thought, other science students in other states would be interested too.

Miss Frost and her camera crew drove to the Imperial Valley from Los Angeles (Eagle Rock High School is part of the Los Angeles City High School District) to get pictures for the biology class on this subject. They "shot" motion pictures of the date gardens in various stages of growth and cultivation. A complete story of the production of the famed California natural, unprocessed dates was recorded on 16mm. film. The crew made a special point of photographing carefully the process of hand pollination, an artificial method of fertilization unique in plant life, in which the biology class was particularly interested. The science students were so pleased and interested in the pictures obtained that much creditable detailed research work was done in this unit of study and excellent study guides were prepared to accompany the film.

Miss Frost and her Camera Crew

The photography throughout the film is unusually good, meeting, and in some respects surpassing, standards held to in the typical commercially-produced film

(*Concluded on page* 44)

Lantern Slides of Cellophane

Suggestions for varied and systematic uses of hand-made slides for effective teaching

By MAHLON R. WEBB and STERLING O. WILSON
Collinwood High School, Cleveland, Ohio.

NO single type of materials and no one method can ever meet the needs of all teachers or all learners. Teachers, oftimes, develop special techniques that prove particularly valuable and useful. But single patterns, as such, do not apply in the field of "human engineering." Only a variety of patterns can satisfy a diversity of needs. Individual differences are best provided for in devious ways through liberal use of a wide selection of methods and materials. After all, the personality and enthusiasm of the teacher coupled with zestful variety of material seem to have about as much to do with success in method as any relevant factors.

The approach outlined here, therefore, is simply another way of doing things that seems to be bringing results. There is nothing new about student or teacher-made lantern slides. They have long been utilized. But the lantern slides that can be made easily and quickly by student or teacher on cheap transparent cellophane, either dashed off on a typewriter, traced in india ink, or colored in rich Japanese color inks is another matter, and should bid fair to arrest some attention.

For instance, if typewritten slides are desired cellophane sheets of proper size, under radio carbon mats, are inserted in the typewritter and run off exactly like any other carbon copies. The typewritten cellophane sheets are then inserted between the two slide glasses, bound top and bottom with adhesive passe partout, and the slides are ready for projection. By this simple procedure slides are quickly available for purposes of reviews, objective tests, drills, vocabularies, and similar uses.

Should illustrated diagrams or drawings be needed, the slide is drawn on the cellophane with India ink. The transparent cellophane is placed over the drawing or illustration and traced with India ink. A crow quill pen proves most satisfactory. If desired, original figures or diagrams of the proper size can first be made on regular drawing paper. Cellophane is then placed over the original drawing, thumbtacked to the drawing board, and then traced onto the cellophane.

In the case of colored slides the India ink outline on the cellophane can be filled in with brilliant Japanese color inks by means of a quill pen. For example, in the schematic outline of the circulatory system it is advantageous to color the arteries red, capillaries pink, and veins blue. These colors show up most beautifully without any diminution when projected on the screen, and the various parts are accentuated and stand out in bold relief. Any printing or labeling may be done free hand directly on the cellophane slides by having sheets with guide lines immediately beneath the transparent cellophane.

Slides can be shown in a lighted room and notes taken while they are on the screen. The screen should be shaded from any direct light at the front of the room. In this way, the illumination on the screen and the notebook are about equal. This avoids eye strain which would occur if pupils were constantly looking back and forth from a brightly illuminated screen to poorly illuminated paper or notebooks. A small pointer may be used at the lantern. The sharply defined shadow of the pointer appears on the screen, and may be used to direct and focus attention upon any particular point or area.

One of the favorable features of these easily made slides is the fact that if the subject is changed, or improved drawings used, the only money loss is that of the cellophane. This loss is negligible as the two plates of slide glass and top binding can be used over again with any new cellophane drawings or diagrams. On the other hand, should a valuable slide meet with accident through careless handling only the outside glass plates can be broken. The enclosed sheet of cellophane, on which appears the drawing or illustration in color, is still available as the cellophane is unbreakable. All that is required is to place the preserved cellophane between two new glass plates, and the same slide is ready for use.

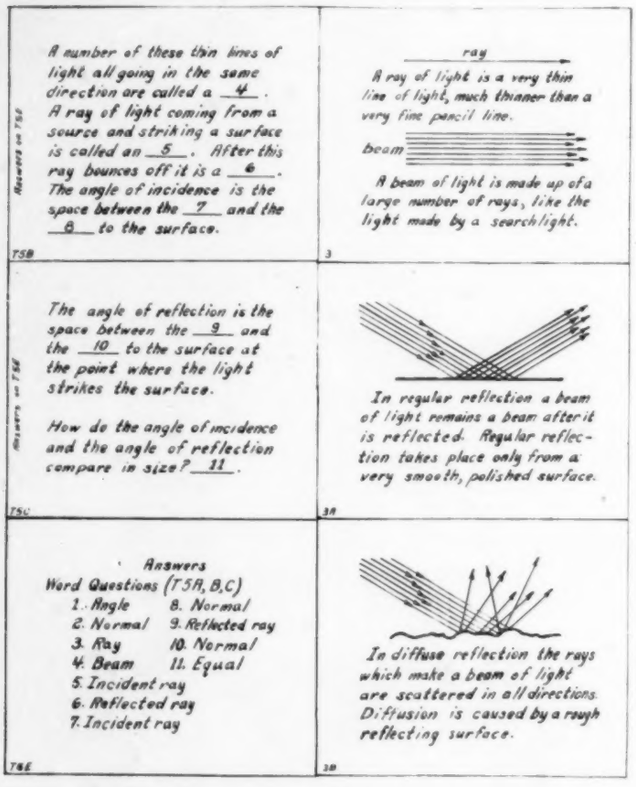
Rolls of cellophane and Japanese color inks can be secured at any five and ten, drug or department store. The inexpensive adhesive passe partout, and the radio carbon mats can be purchased at any stationery store, supply house, or such firms as Radio Mat Slide Company and Keystone View Company, which handle materials of this kind. The clear glass slide plates, three and a quarter inches wide by four inches long, cost $1.80 a hundred. This brings the cost per slide between three and four cents, depending somewhat upon the type of slide desired. This does not take into consideration the substantial saving that is effected by the elimination of the cost of stencils and mimeographed paper that would otherwise be necessitated in lieu of the cellophane slides. Slides keep indefinitely, but stencils do not. The larger the classes the greater is the saving in both paper and stencils.

Six slides may be drawn on one sheet of cellophane, eight inches wide by nine and three quarters inches long. Before cutting the six drawings apart it is especially advantageous to either make a blue print or print the intact drawing on a sheet of photographic paper. The transparent inked cellophane is similar to photographic negative and may be printed on either photographic or blueprinting paper. The six drawings are easily accommodated on a single sheet of blueprint, the same size as a sheet of typewriter paper, eight and a half by eleven inches.

When these blueprints are bound together they

make cheap and ready reference books which may be used by teacher or pupils. The books provide handy references for the teacher. It aids pupils, who have been absent, in making up any lost work. Pupils, for instance, who have missed a regular test can come into the classroom, during any one of their study periods, and make it up. One decided advantage, here, lies in the fact that the pupil may take the test individually while the teacher conducts the regular recitation, without any appreciable loss of time by either student or teacher.

As one way in which these easily made slides may be used along with regular class room procedures, a


A number of these thin lines of light all going in the same direction are called a ___4___.
A ray of light coming from a source and striking a surface is called an ___5___. After this ray bounces off it is a ___6___. The angle of incidence is the space between the ___7___ and the ___8___ to the surface.
ray
A ray of light is a very thin line of light, much thinner than a very fine pencil line.
beam
A beam of light is made up of a large number of rays, like the light made by a searchlight.
The angle of reflection is the space between the ___9___ and the ___10___ to the surface at the point where the light strikes the surface.
How do the angle of incidence and the angle of reflection compare in size? ___11___.
In regular reflection a beam of light remains a beam after it is reflected. Regular reflection takes place only from a very smooth, polished surface.
Answers
Word Questions (T5A, B, C)
1. Angle
2. Normal
3. Ray
4. Beam
5. Incident ray
6. Reflected ray
7. Incident ray
8. Normal
9. Reflected ray
10. Normal
11. Equal
In diffuse reflection the rays which make a beam of light are scattered in all directions. Diffusion is caused by a rough reflecting surface.

Reproduction of a group of six cellophane slides, about half actual size

ninth grade lesson on the reflection of light will serve to illustrate how cellophane slides may supplement and lend variety to instruction, demonstration, review and testing.

Ninth grade pupils usually do not have clean-cut conceptions of such geometrical terms as "angle." They have probably never heard the word "normal." Frequently they fail to clearly distinguish between "ray of light" and "beam of light." The terms "incident ray" and "reflected ray" are entirely new to them.

These new terms are introduced to them by means of class demonstration. The slide projection lantern is set up in a darkened room. The word "ray" is introduced to them by using a piece of cardboard or metal the size of a slide. This opaque slide has a small hole in the middle of it and the light shines through the hole onto the screen or wall. This gives a pencil of light which serves to illustrate a ray of light. when properly explained. By removing the metal slide the word "beam" is illustrated. Chalk dust in the air makes the course of the ray or the beam visible.

The convenience of the use of rays in studying light is explained. The ray is then reflected from a mirror and more chalk dust used to make its course visible. The incident ray and reflected ray are clearly seen. A yardstick perpendicular to the mirror at the point where the ray strikes it illustrates the normal. The angle of incidence and the angle of reflection are seen, and are seen to be equal.

The room is then illuminated with daylight by raising the shades, except the shade nearest the screen. The screen is in shadow. The lantern is turned on, the first slide is projected on the screen and may be copied in the notebook of the pupils. The same procedure may be followed for each slide in the series. As shown in the accompanying blueprint illustration the slides follow each other in numerical sequence. The slides of objective tests are of course based upon the preceding instructional slides used in the visual demonstrations and classroom experiments.

Thus, does cellophane become an inexpensive and readily accessible medium that may be used in a great variety of ways for translating, quickly and conveniently to the lighted screen, facts, concepts, and principles that all can see and understand.

Student Camera Crew Makes A "Scoop"

(*Concluded from page* 42)

of this kind. The film served its purpose admirably at Eagle Rock, but new titles and editorial material would have to be introduced to make the film altogether acceptable in other places.

The Eagle Rock camera crew is now working on a teaching film on avocado culture. Here again they are working on a unit of study in practically unexplored territory. And here again it is fitting that they, as Californians, should make this study. The crew is engaged also in completing a film on historic spots of early California. Field trips already taken have yielded excellent pictures of Monterey and several others of the more important missions.

The crew is given training in photography, motion picture projection, motion picture camera operation, unique camera angles, light and color values, balance, subject relationships, continuity, sequences, composition, and editing. And, as may be expected, the students, struggling to obtain excellence in their own pictures, are found to be unusually critical and appreciative of the commercial films they see.

The equipment used at Eagle Rock, much of it privately owned, is of excellent quality. Careful use of this equipment is insisted upon at all times. The crew works with a diligence and regard for responsibility that is noteworthy even for a highly selected group of older high school boys. Yet work is informal and cooperative. There is no barrier of a teacher's desk here, either in the classroom or in the field. In this creative activity at Eagle Rock, teacher and students pool their resources in an absorbing study of how they together can make each picture the finest possible educational experience for both producer and user.

The Ocean Comes to School

The growing use of camera by teachers illustrated in the field of biological science

By HOLGER and DOROTHY VAN ALLER*
High School, Saratoga Springs, New York

HIGH school biology courses no longer require memorization of innumerable scientific names of orders and classes, and the intricate study of the anatomy of an organism representing each type. Syllabi called variously General Biology, Social Biology, Functional Biology, are rapidly replacing the old structural type of zoology-botany. But even in these new courses—which attempt to bring out the unity of life, and the relationship and interdependence of man with all other organisms,—there remains of necessity a unit describing the variety of living forms. Students meet the names of the phyla, and attempt to classify the animals they know in the proper places. This is easy enough with the horse, oyster, daddy-long-legs, and even bat. They know what they look like, and with a bit of logical reasoning can fit them into the descriptions of the phyla and important classes. Yet they are asked also to classify the sea anemone, sea-urchin, barnacle and starfish. No amount of logic will allow them to locate sensibly animals which are to them only names. Mere rote is the only solution. And mere rote does not help to establish an organized understanding of biologic principles, nor even a lasting knowledge of simple facts.

Our first solution for this problem was the purchase of an aquarium assortment of living marine forms through a supply house from Woods Hole Marine Biological Laboratory. Here was the perfect demonstration of tide water animals unknown to our inland pupils. Radially symmetrical starfish with spiny skins crawled along the glass, even digested bits of clam in plain sight of observers; spiny-skinned sea-cucumbers occasionally waved radially symmetrical tentacles in search of food; sea-urchins flourished on invisible nourishment. All were readily identifiable as echinoderms. Hermit crabs scuttled about the bottom. Self-cemented to the glass, clams early became permanent residents. A horse-shoe crab, with its prominent exoskeleton and two-sectional body, burrowed often in the sand. When disturbed, sea-anemones demonstrated their complete lack of skeleton by contracting to a naval-like button; yet they expanded again to take food into their hollow interior and cast off the remains through the same mouth through which they had received it.

This was teaching material of the best visual type. It had, however, one serious drawback. Familiarity should precede induced principles, and the children should know the animals before they attempted to classify them. But marine aquaria will not live in warm weather, and our unit on the variety of life was first in the course and came in mild September. We could not, if we wished to keep the specimens alive for more than a day or two, buy the animals until December or January. They had not then their maximum value.

The next year's pupils had more help at a better time. Starfish again crawled on the glass and pushed their stomachs out and around a bit of food; anemones again contracted and expanded; hermit crabs again scuttled on the sand. Now, however, they were demonstrating their habits of living on the screen instead of on the windowsill; and they were doing it in September when their study gave most incentive to learning. We had taken movies of the animals with the aid of the title-card attachment on our inexpensive camera. When freezing weather and our marine assortment came together, there was even more interest than before in the living animals. Upon their death, at various times from two weeks to six months, the animals were preserved in formalin as permanent study specimens.

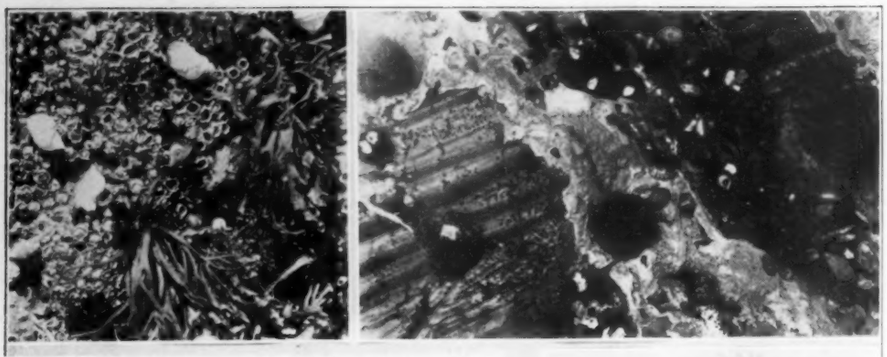
It took still another year for our tide-water exhibit to reach its present form. We had the opportunity to visit Acadia National Park on Mt. Desert Island during the summer. From the top of Mt. Cadillac the far-reaching view of Maine's infinitely repeated inlets and islands enraptured us, though not so much as

On the Maine Coast, where photos of tide-water animals were made at low tide.

did the closeups of the shore from Otter Point Drive. There pink granite rocks were sprayed with blue water splashing white. In pools left by the lowered tide cursory examination showed life; and more thorough inspection, anemones and limpets and urchins. We walked on barnacles and on whelks clinging to slippery rockwort. Anemone Cave we found appropriately named.

A week later we returned after careful study of the

* Holger Van Aller teaches science in the Saratoga Springs High School. Mrs. Van Aller, who has also taught, works with him in photography.



Upper Left—**Bottom of tidal pool, featuring Mussels, Limpets, Sea Urchins**
Upper Right—**Barnacles and Whelks**

Sea Cucumber partly extended but without tenacles showing

Sea Anemones Expanded

too, shots of a more general nature, for biology must show where organisms live, how they are as they are because they live where they do. The water changed levels on the cliff as it rose to cover a pool we had worked in. Spray dashed high to provide its water with the abundant oxygen the animals need even in an aquarium. To the rocks above the sea clung wind-contorted evergreens. We had used both a still and a movie camera, black-and-white and Kodachrome film. As a result our pupils now have slides and natural-color films of echinoderms and coelenterates in their natural environment as well as in an aquarium.

Our marine visual unit is not yet complete. We want to again visit the University of Maine's biological laboratory, this time when conditions are right for photography. There starfish and giant cucumbers are scraped up from deep piers, salasters and jelly fish are brought in from excursions through the bays. We have enjoyed watching this for ourselves, and we can describe it to our students. But no vocal exposition can approach the vividness of a good motion picture. We are neither great marine biologists nor professional photographers. It is only an amateur interest that we have in both fields. Yet our pupils have profited by this product of the combination of our hobbies.

tide tables. We wished maximum time for photographing these animals which are revealed only when the water is at its lowest point. Rushing about from rock to rock, we managed to obtain movies and stills of much that we wanted before the water returned. There were barnacles feeding in shallow water, barnacles tight shut on rocks temporarily dry; urchins righting themselves when turned upon their backs; a whelk struggling to release itself from the tube feet of an urchin; pink anemones closing after a stick had disturbed them; limpets immobile on stone. We wanted,

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Suggestions for Camera Clubs

By WILBER EMMERT
State Teachers College, Indiana, Pa.

THROUGH the formation of school camera clubs those pupils who have taken up photography can employ their leisure time advantageously. The club might augment its membership by inviting others, carefully chosen, to participate in the activities of the organization. If the club is to be successful and justify its existence, it must have a definite, well planned program of action for the school term. In addition to securing individual personal benefits from the organization, the club must stand ready to render some service to the school sponsoring it.

One suggested list of club program topics includes the following items: History of photography; Picture taking with a pin-hole camera; Light lenses, and exposures; Sources of photographic equipment and materials: Composition in pictures; Constructing the dark room; Developing the film; Making the prints; Experience with various kinds of cameras; Action pictures of athletic events, etc.; Formal and informal group pictures; A visit to the local photo gallery; Portrait picture with portrait lens; Interiors with flash light and photoflood lamps; Theory and practice of enlarging; Amateur motion picture photography; Photographic amusements and oddities: Open house exhibit of results of camera contest.

The bibliography published in the EDUCATIONAL SCREEN, October, 1937, page 266, furnished a list of reference books and materials covering the field of photography and of value to the camera club advisor.

Laboratory guides and direction sheets can be devised by the club leader to assist the students with their problems. Such a plan will put the work on a laboratory basis and allow the pupils to do their own work, using the advisor as a laboratory assistant.

FOREIGN FILMS FOR EDUCATIONAL INSTITUTIONS

Conducted by Marie Zoe Mercier

Film in Art Study

IN THE field of art study perhaps more than in any other, does the use of film, itself the product of a creative activity, offer almost indispensable aid. A few of the more recent foreign film productions suggest several new methods for class presentation.

When *La Kermesse Heroique*, directed by Jacques Feyder and starring Francoise Rosay, was scheduled for a showing in Cambridge, by the French Talking Films Committee, Mrs. Belle P. Rand, Chairman of the Committee, arranged with the Fogg Art Museum at Harvard to exhibit a few of its more valuable Dutch prints in order to illustrate the film's unusually successful representation of life in seventeenth century Holland. We have chosen for comparison here a Frans Hals portrait in the Art Institute of Chicago. This type of comfortable, blustering burgher, so easily a

Willem Van Heythuyzen by Frans Hals
(owned by the Art Institute of Chicago)

prey to his own vanity and bravado comes to life as the chief bait in the delightful and witty satire. All the men in the Dutch town of Boom decide to hide and the mayor to play dead one day in 1616 when Spanish couriers thunder by to the town hall and announce that Spanish soldiers will be quartered in the town that night. The women, led by Madame Burgomaster, take the situation in hand, dress up in their best finery and organize a feast of welcome. Their hearts may have quaked as shamefully as the men's but they soon find them melting delightfully to the unexpected charm of such an invasion of gay and colorful cavaliers. As a reward the Spanish duke on his departure, exempts the town from taxation for a year.

The Mayor of the Dutch Town of Boom

There is a disturbing note in the fact that the young painter named Breughel paints a group portrait of the town worthies that immediately suggests Hals' famous Guild paintings. However many of the less recognized derivations are obviously inspired by the Breughel tradition with all its transitions through Van Ostade and Jan Steen. Feyder, the Director, and Meerson, architect and decorator who designed sets for the famous Rene Clair films, have written of the care with which they authenticated as much detail as possible from existing prints and paintings. Perhaps the fact that the story is eminently a fantasy makes its adherence to familiar genre pictures the more gratifying and aesthetically satisfying. We expect almost too much accuracy, for instance, when Alexander Korda reconstructs an actual life like that of Rembrandt. We may even sympathize with the antiquarians who remark that with all the healthy and boisterous drinking going on none of it is appropriately out of "Rembrandt," "Jan Steen" or "Frans Hals" flagons but out of Swiss, Scottish and German varieties; also that iron baking stoves like that in which Rembrandt unconcernedly roasts a goose, aren't known to have existed before 1660.

So much for the suggestions for study in the carefully constructed costume play. Another entirely dif-

(*Concluded on Page* 49)

AMONG THE MAGAZINES AND BOOKS

Conducted by Stella Evelyn Myers

Time (30:19-21, Dec. 27, '37) "Mouse and Man."

Even artists are recognizing Walter Disney as an artist. His works are certainly better known and more widely appreciated than those of any other artist in all history. His "Mickey Mouse" recently created a crisis in the government of Yugoslavia; as "Miki-san" he has been Japan's patron saint. In Russia, he is a social satirist, depicting the "capitalist world under the masks of mice and pigs."

"Snow White and the Seven Dwarfs" was three years in the making. Being the most ambitious animated cartoon ever attempted, it dipped into the Disney pocket for $1,600,000, and the project was dubbed "Disney's Folly." Hollywood wondered if a fairy story could contain enough suspense to become a feature. If this might prove true, would an audience care about the fate of characters that were just mere drawings,—even if there were a quarter of a million of them? "A combination of Hollywood, the Grimm Brothers, and the sad, searching fantasy of universal childhood, it is an authentic masterpiece, to be shown in theaters and beloved by new generations."

An interesting description is given of the difficult technique used. Sound engineers synchronize three tracks of sound that have been variously recorded. It takes two weeks simply to photograph a 750-foot short.

Teachers College Record (39: 207-217, Dec. '37) "Learning through Film-making," by Kerry Smith and Irene Lemon, both of Horace Mann School, Teachers College.

A complete description of how a tenth grade class composed and produced an 800-foot film serves to indicate a cogent way of sensitizing pupils to important social problems. The subject of the film is that of an Italian immigrant family and their adjustment to their adopted country.

A synopsis of the motion picture is included in the article, and a full treatise on the "Values of the Film Medium." The latter is highly recommended to any instructor considering film production. A section devoted to "Suggestions at Large," includes hints for sound production (although the Horace Mann film was silent) the filming of animated graphs, maps, and cartoons, and the recording on celluloid of telling scenes observed on excursions. Many other splendid visions for the future will tempt wide-awake educators.

Movie Makers (12:536, Nov. '37) "Map Movies" by Kenneth F. Space.

It has been discovered that, by using a definite technique, the filming of maps in a travel picture can be greatly enhanced. Map illustrations are given to clarify the conclusions. Route animation is described, and various clever substitutes for it, one being the use of a magnet, and others more simple but as effective. Double exposure stunts furnish many helpful hints. For filming relief maps suggestions are also given.

Book Reviews

TALKING PICTURES—HOW THEY ARE MADE—HOW TO APPRECIATE THEM. By Barrett C. Kiesling. Published by Johnson Publishing Company. 340 pages, cloth. Price, $1.40.

Here is the most comprehensive and complete presentation of Hollywood motion picture production yet made. It covers not only major points in history and process but all the nooks and corners; it is beautifully illustrated; it retails vividly and readably countless facts and anecdotes, the important and the trivial, the scientific and the merely sensational; it includes an unusually complete Glossary of technical terms and of the industry's jargon; it affords easy and accurate reference to specific details through a well-itemized Index; it aims to inform and obviously also to impress, and contains withal a sufficient proportion of error to prove the author thoroughly human. One educational magazine pronounces it "the first textbook written from inside the motion picture industry . . . for classes in visual education, English, dramatics, guidance, social studies, and science." It is certainly done from the "inside" and should be read by every student of the field, but as a "textbook" for naive readers it needs to be taken with many a grain of salt.

The second sub-title, "How to appreciate them," merely continues the industry's ancient device for turning the public's critical attention away from picture content to the vast intricacies of the producing business. It is repeatedly stated and implied throughout the volume that motion pictures cannot be appreciated or critically appraised unless all these marvelous facts are known. As well claim that a literary work cannot be appreciated unless the reader knows all details of printer's ink, press-work and paper-making; or that one must know all the workings of a paint factory and just what part of a camel produces camel's hair brushes before he can appreciate a painting. Appreciation of a finished motion picture must base on what appears on the screen. It has nothing to do with antecedent facts however wonderful or colossal, such as the thousands of extras who are starving in Hollywood, or the property building that contains "350,000 separate articles," or the miles of film left on the cutting room floor, or the thousands or millions or billions of anything, nor even with the Assistant Director's "Set Secretary" who records all details of every shot "even to the size and number of dots in the leading man's tie." Breath-taking feats of "research" and "check-up" are most desirable, of course, to keep General Grant from riding in an automobile or Julius Caesar from wearing spats. But more research, or mere intelligence, put upon the mental content and emotional truth of pictures would yield still better

dividends. A wrong button on the sleeve of a uniform in a good picture is about as important as a misprint in a good book. It is the intellectual content of each that counts.

We could wish the book had been made less startling and more accurate. The thrilling information that "276 arts, professions and vocations" are involved in production is quite awe-inspiring until we look over the 276. We expected *"musicians,"* for example, to be one of them. But, no! Instead, we find that (singularly and plurally) *bass violin player, cellist, cornetists, flutist, harpist, pianist, violinist, orchestra leader, voice coach, singing instructor, music arranger, music copyist, music composer, alto, soprano, baritone, and basso* are 17 of the 276. But why not *saxophone, clarinet, drum,* and above all the *tenor?* Evidently the oft-quoted figure 276 is meaningless, and could be expanded or contracted at will. And the author treats the great fundamental chemical facts of all photography as follows! Speaking of the silver nitrate emulsion he says, *"When it is exposed to the light its white crystals turn black."* (!) (But it is the developing that does this, not the exposing). *Then, "Put this exposed film in a bath of special chemical formula and it is 'developed,' that is to say, the unexposed nitrate of silver is removed."* (!) (But it is the hypo that does this, not the developer). And then he does not mention the supremely important hypo at all!

The author denies any intention of "stimulating the importance" (sic!) of the industry in the reader's mind by big facts and figures. But, as an example of what we consider decidedly quaint "textbook" material, to put it mildly, we quote from his preoration the following arithmetical rhapsody:

"The world investment in studios and theatres is $2,650,000,000. To earn that sum at a salary of $2500 a year would take a man 1,060,000 years. . . . Estimated weekly world attendance upon photoplays, 220,000,000 people. If these photoplay attendants stood six feet apart, number one would have his feet in Lake Michigan while the last looked out upon a sunset over the Pacific Ocean. Such comparisons to illustrate the Gargantuan size of the film could be indefinitely prolonged." Isn't it all just too wonderful! N. L. G.

THE NEW LEICA MANUAL, by Willard D. Morgan and Henry M. Lester, New York City (580 pp. cloth. Publisher's price, $4.00)

The extraordinary advances made in miniature camera photography during recent years have been aided in no small degree by the original "Leica Manual," published by the above authors three years ago. In the EDUCATIONAL SCREEN for November, 1935, we reviewed at some length that volume as a "noteworthy book in all respects." Immediate and continuous success carried the book through two editions and four reprintings. The current volume, issued last fall, is the "third edition revised" and shows notable additions and improvements over all preceding editions.

The book has now grown to 580 pages; nearly 200 new photographs have been added; revisions throughout, affecting practically every page, have brought the subject-matter up to date in this field where change and development are swift and incessant; and many entirely new chapters have been added. Four of these, of particular interest to the educational field, are "Leica Adventures in Russia and the Far East" by the eminent traveler-lecturer-photographer, Julien Bryan —a chapter on the making of stereoscopic pictures through a single lens, by Augustus Wolfman—another, by Henry Lester on the use of Kodachrome in color photography — an extremely well-written chapter on the use of cameras in Archaeology and Exploration, by Charles Breasted, son of the famous head of the Oriental Institute in Chicago—and an able presentation by Roy E. Stryker of the possibilities of still pictures in series done expressly for teaching purposes.

The range of content in the volume is amazing. Camera technique in all its phases is covered in detail, from the elementary facts and procedures needed by the amateur, to the intricate processes and formulae required by the professional. Index and references make it simple for any user, tyro or expert, to find quickly what he wants amid this mass of comprehensive and interesting data. As the use of cameras for educational purposes in school and college increases, this New Leica Manual will prove invaluable however modest or elaborate the scale of work projected. Both beginners and veterans will profit by its pages. The price ($4.00) remains unchanged from the first printing in 1935. N. L. G.

Film in Art Study

(Concluded from page 47)

ferent approach to the place of film in Art study is suggested by the short *Schwarz, Weisz, Grau* by L. Moholy Nagy, recently appointed head of the New Bauhaus American School of Design. This film is a painting in which light is used as the medium of expression instead of pigment and the camera as a tool instead of a brush, in which the variations of black and white and grey become as exciting as color because of the movement with which they are invested. Mirrors, prisms, transparent celluloid, construction of glass, quicksilver and gleaming chromium that reflect, transmit and break up the light into new patterns and forms are the active elements involved. At a recent lecture before the Chicago Institute for Color Research, Mr. Maholy Nagy demonstrated the dramatic light qualities obtainable from a sheet of five hundred rectangular pieces of mirror attached to a common felt base but unattached to each other, a device which he designed for producing some of his special effects in the film *Things To Come.* The result of the proper manipulation before a light source is that of a solid brick wall suddenly flying to all corners of the room with a kind of fairy tale magic.

His short film *English Zoo Architecture,* made for the Museum of Modern Art and Harvard University, is an excellent example of the record type of film which always has its appropriate illustrative place. Lubetkin, designer of the Zoo, is a Russian architect at the head of a young group in London who are responsible just now for some of the most interesting architectural productions in England. The Penguin pool especially is a masterful bit of constructivist design and is reported visually as such by Mr. Moholy Nagy in one of his most successful shots.

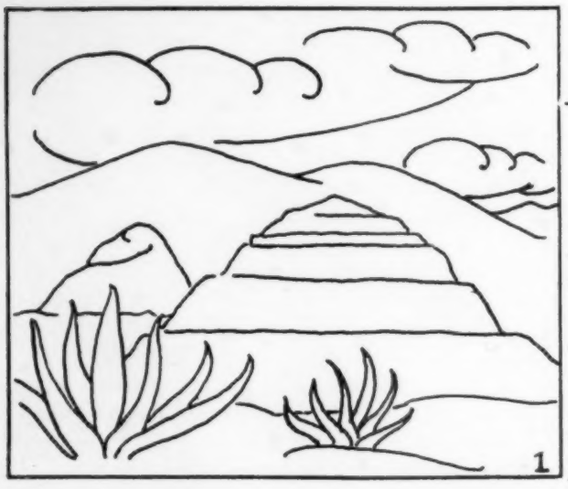
Ancient Ruins in Mexico - - - In Hand-Made Lantern Slides

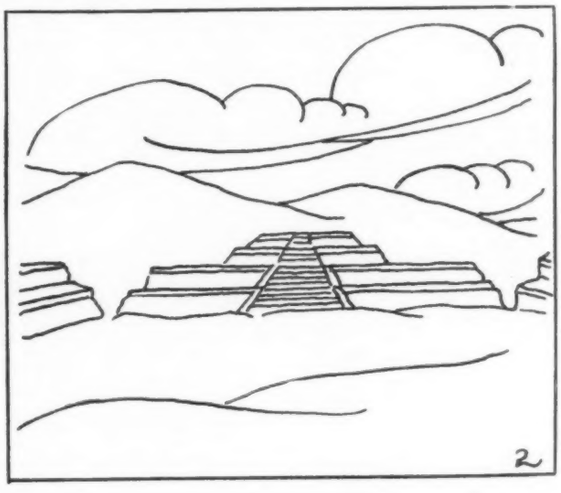
By ANN GALE

Art Department, Lindblom High School, Chicago

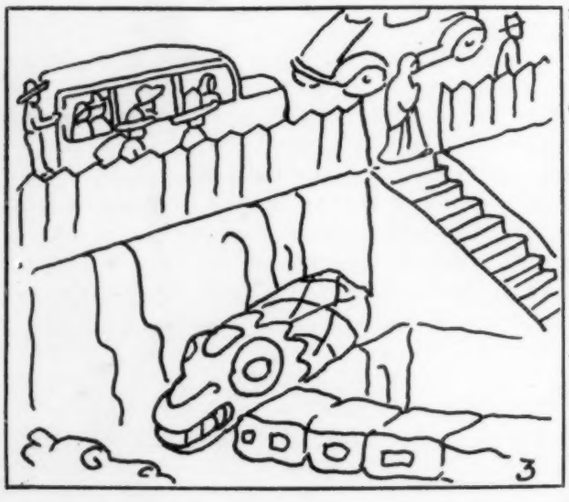
IN sixth grade when children study older civilizations it would be possible to study the ancient culture of Mexico. Mexico City and the region around it are full of the ruins of Toltec and Aztec civilizations. These slides could form the basis of a discussion of pre-Cortes civilization in Mexico.

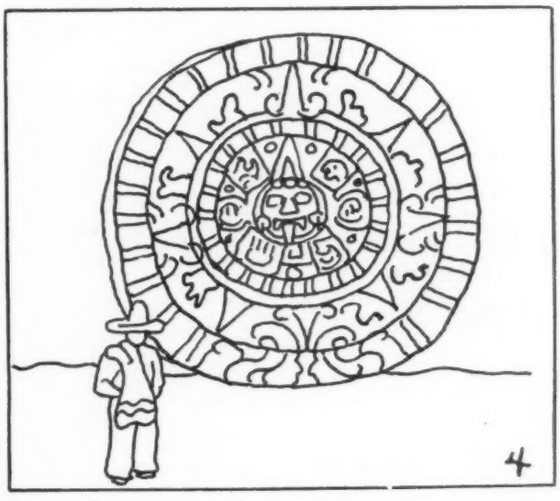
(1) Twenty miles from Mexico City are the Toltec pyramids of the Sun and Moon. (2) In this same place is the large temple of Quetzalcoatl, the Mexican God of agriculture. (3) The ruins of an Aztec temple were found right in the middle of Mexico City's busiest section. (4) In the National Museum is the Aztec calendar stone showing the Aztec symbol for the months and the day of their year. (5) A church stands on top of an overgrown pyramid in Cholula, a town about fifty miles from Mexico City. Cortes had razed to the ground the Aztec temple which originally stood there and replaced it with the church. (6) Perched high on a mountain top is the Aztec pyramid of Xochicalco.

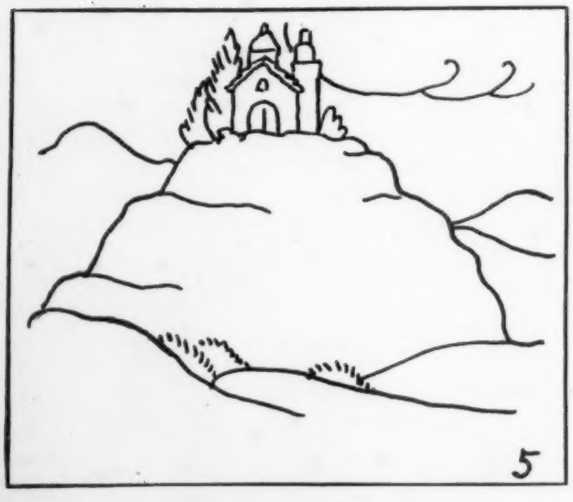


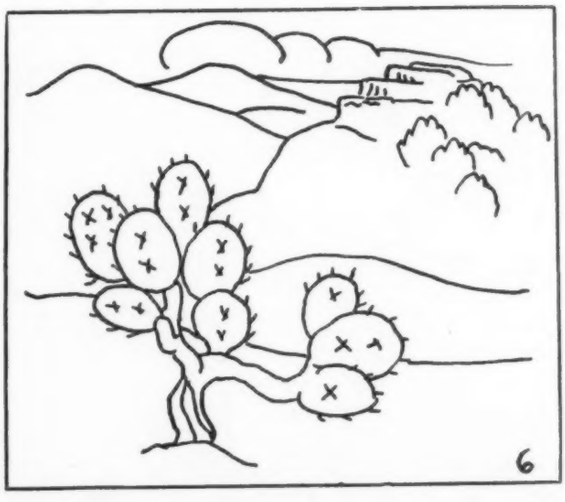


The simplest type of hand-made slide is made by drawing or tracing on finely finished etched glass with ordinary medium lead pencil. Color, by special crayons or inks, enhances the slides greatly. Fine effects are obtained by blending with crayons. About one - third inch margin should be left all around the slide. The slide is readily cleaned with soap or washing powder to receive a new picture.









DEPARTMENT OF VISUAL INSTRUCTION

IF THERE is one thing that has been discovered in research in the field of learning, it is that there are very great individual differences in the way that students learn. Some learn best by listening, by asking questions, by talking with others about the problem. Some take readily to books and have great skill in getting information and understanding from the printed page. Some find understanding through laboratory and manipulative activity. Some learn by getting ideas visualized, charted, graphed, pictorialized. There is no royal, no single road to learning.

If these statements are accepted as true or even as partially true, it would seem to argue for much greater flexibility in the learning materials used in our classrooms. We would avoid any strait-jacket of methods, whether it be recitation, laboratory, lecture, or what not. Instead, we would set up clear-cut goals in cooperation with our students, let them discover by self-testing methods just what progress they had already made in reaching these goals, and then with the guidance of the teacher determine the kinds of experiences which they believed would lead them to fuller understanding. Careful evaluation programs would enable the student and the teacher to work out co-operatively a continuous testing program to determine what progress was being made.

Under such a scheme we would put far more dependence upon libraries and laboratories than we have in the past, not merely libraries with a rich supply of excellent books and periodicals, but libraries well equipped with phonograph records, radio recordings, silent and sound films, slides, mounted photographs, charts, maps, models, plans for excursions, and the like.

I am arguing, then, for richer learning experiences. I am suggesting getting away from stereotyped recitation or lecture methods. I am suggesting a greater participation of the student in selecting his own diet—a diet far more varied than at the present time.

Impractical and visionary? Not at all. Many schools have made fine steps in this direction. Would it require smaller classes? Of course it would. And how would we afford it? Let me make one brief statement. Technological change has made it absolutely necessary that we use fewer people in the production of goods and several million more people in the service areas—health, medicine, the arts, teaching, recreation, and the like. There is no choice here. We must either put them in these service occupations, put them on a dole or let them starve. There is no reason why these hundreds of thousands of persons could not be put to work preparing the kinds of materials that I have been thinking about, and hundreds of thousands more could be used to make it possible to reduce class size, not from 37 to 35, but down to 20 students a class. To really do a fine diagnostic job, to plan for and with each student, to provide a far richer learning experience than we have at the present time, makes such reduction in class size necessary. Can we afford it? Rather, can we afford not to do it? —EDGAR DALE.

PROGRAM

Department of Visual Instruction of the N. E. A.

Room 13, Atlantic City Auditorium

February 28—March 1, 1938
Looking Ahead in Visual Instruction

February 28, 1938—9:00 A. M.

Evaluating the Literature in Visual Instruction
Etta Schneider, Teachers College, Columbia University

Problems in Preparing Pictorial Material for Class-Room Use
James Mendenhall, Editor, "Building America"

The Motion Picture in General Education
Charles F. Hoban, Jr., American Council on Education

In-Service Teacher Training in Visual Instruction
Paul Reed, Rochester (New York) Public Schools

President's Address—Edgar Dale

March 1, 1938—9:00 A. M.

Teaching Problem Solving Through the Use of Visual Materials
Louise Heil, Bureau of Educational Research, Ohio State University

Amateur Motion Pictures in the Schools
E. Winifred Crawford, Director of Visual Education, Montclair (New Jersey) Public Schools

Producing Visual Aids
Herbert S. Walsh, New York City Public Schools

Need for National Planning in the Distribution of Visual Materials
J. E. Hansen, Bureau of Visual Instruction, University of Wisconsin

Panel Discussion: *Planning for the Future in Visual Instruction*

Application for Membership

Department of Visual Instruction
National Education Association
Box 3046 University Station
Columbus, Ohio

Gentlemen:

I hereby apply for Membership in the Department of Visual Instruction and attach a remittance for $2 to cover dues for 1938, including magazine subscription and other services.

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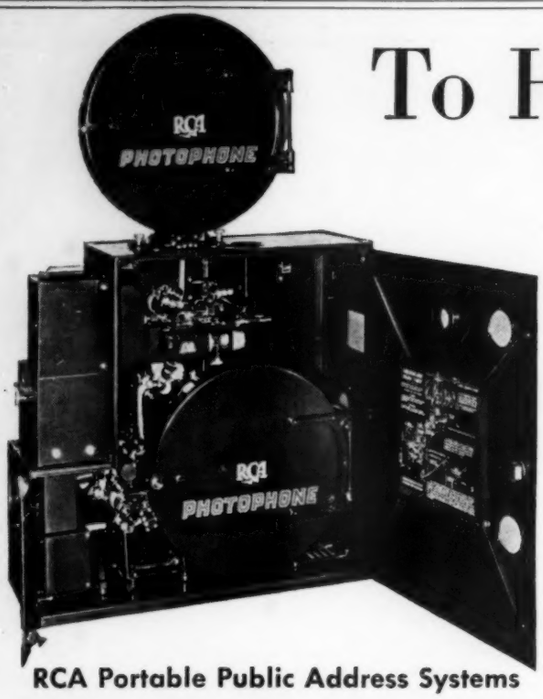


RCA Portable Public Address Systems

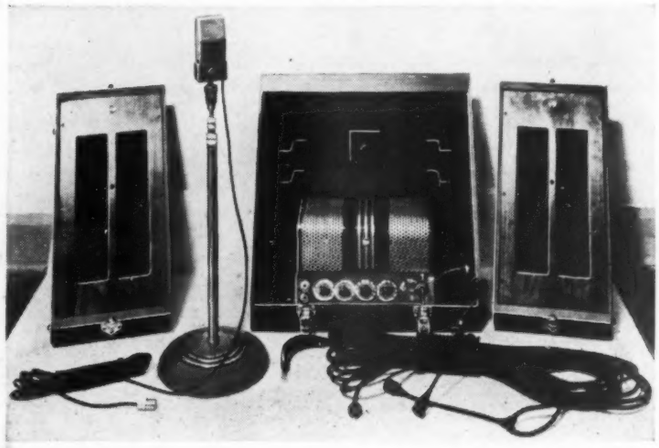
RCA Victor Public Address Systems are designed for interior or exterior use. Special weather-proofed loudspeakers available for permanent installations to serve playgrounds, football and baseball fields. Wherever a school gathering is held, a public address system is of great aid to those who listen. It is usually a necessity.

Equipment illustrated at right is Model PG-112 which includes RCA Junior Velocity Microphone, two heavy-duty permanent Magnet Speakers. May be used from either 110-volt AC outlet or from 6-volt storage battery in conjunction with a dynamotor. Provides enough volume for audiences up to 2,000 persons. May be carried from room to room and set up in a few minutes.

RCA Sound Motion Picture Projectors

RCA has a complete line of 35 mm. sound motion picture projectors to cover every possible requirement. This equipment profits by the same research that makes RCA Photophone installations in theatres throughout the country so successful. Trouble-free performance such as these theatres enjoy, is assured to you.

At left is RCA Photophone Portable Projector, Model PG-81 with 900 or 1,000 watt incandescent lamp. Ample illumination for average room or auditorium.



RCA School Sound Systems

The system is centrally controlled. Through it the school principal may convey radio programs, recorded speech and music, and direct announcements from his office to any or all classrooms. Is of great value for timely educational radio programs, music appreciation broadcasts, language teaching. Enables students in auditorium to hear stage speakers with greater ease. Can also be used to supply music or instruct groups in gymnasium, and for announcements on athletic field. Has unique two-way talk-back feature which permits principal to speak with individual teachers without interrupting classroom work.

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NOW—RCA Victor can help you teach! Its complete sound service is available to all schools—at prices in keeping with moderate budgets.

The equipment shown on these pages is now employed in many modern schools. Briefly, it assures *better* teaching. Students' marks where it's being used *prove* that.

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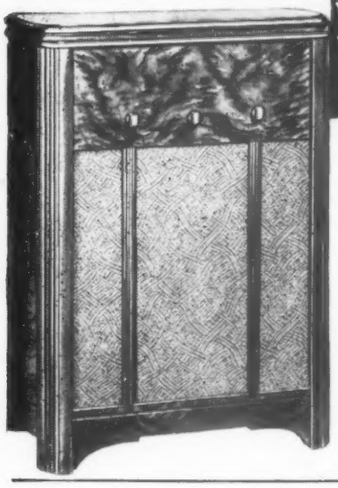

The R-96 Electrola (right), a portable instrument designed for classroom use, is the most inexpensive quality instrument available.

RCA Victor Instruments

The R-99 Electrola (left) provides unequalled reproduction of Victor Records. Here is an instrument offering thrilling, life-like performance at economical cost.

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EDUCATIONAL DEPARTMENT

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NEWS AND NOTES *Being brief notations on significant doings and events in the visual field.*

Conducted by Josephine Hoffman

Visual Education Meeting in South Carolina

"Does South Carolina Need an Audio-Visual Program?" was the theme of a significant Visual Education Conference held at the University of South Carolina, on December 10-11, with Mr. W. H. Ward, Director of the Extension Service, presiding. Dr. Paul Reed of Rochester, New York, spoke at the two Friday sessions and gave the audience the benefit of his many years of experience as supervisor of Visual and Radio Education, Rochester City Schools. As the topic of his first address he chose "The Factors Essential to the Most Effective Use of Audio Visual Aids." In the evening, Dr. Reed cited some practical experiences in administering and organizing the Rochester school system for visual instruction, emphasizing the greater value of having duplicate copies of good films that would be used constantly than a great number of different titles. He also stressed the need for teacher-training classes in visual aids. At the same session Dr. Thomas W. Morgan of Clemson College spoke on the "Visual Instruction Program of the Clemson College Extension Service," which was started in 1936 as an experiment and has proved so gratifying in connection with educational campaigns among the farmers that the motion picture outfits are in great demand by County and Home Demonstration Agents throughout the state.

Saturday morning, Dr. H. A. Gray, Erpi Picture Consultants, showed the film "Adventures of Bunny Rabbit," which was prepared specifically for use in the primary grades, and Miss Julia P. Gaillard and her group of second grade pupils demonstrated classroom use of the subject. Mr. Ward then introduced Mr. Milner of the University of North Carolina Extension Division, who described the establishment and functioning of that Division's recently formed film library. The rest of this session was devoted to a group discussion of the situation in South Carolina and the possibilities for the acquisition of a state film library to be located at the University.

It was recommended that the Extension Committee make a survey of the schools of the state to find out the amount of interest existing in such a library; to evaluate the possibility of the library's paying for itself; and to present its conclusions to the South Carolina Education Association and to the General Assembly.

Source List of Visual Material

The office of Education, United States Department of the Interior, has issued a valuable little pamphlet, No. 80, on "Sources of Visual Aids and Equipment for Instructional Use in Schools," compiled by Cline M. Koon, Senior Specialist in Radio and Visual Education. It classifies visual and auditory aids under seventeen headings and gives the following seven groups of sources for each: Federal Departments, State Departments, Colleges and Universities, Libraries, Museums, Voluntary Associations, and Commercial Dealers. The lists of governmental and educational agencies are far more nearly complete than the commercial sources. Further information is given on composite lists of educational films, organizations and government agencies interested in the educational use of motion pictures, and periodicals dealing with the educational use and influence of motion pictures.

The booklet may be obtained for 10c from the Superintendent of Documents, Washington, D. C.

Survey on the Utilization of Visual Aids

Ten thousand questionnaires were mailed to users of visual aids on January 15, 1938 by Victor Animatograph Corporation. The list was made up from the National Visual Education Directory, compiled by the American Council of Education in 1936, and supplemented by those schools which were known to have purchased either sound or silent motion picture equipment since the publication of the Directory. A report on the final returns will be compiled and ready for distribution about February 15th.

The survey was designed to serve as a basis for setting up an Educational Department to counsel schools in the selection and utilization of visual aids. Since the wide range of material included in this field makes it impossible to cover each phase completely in a survey of this nature, emphasis is placed on the most recent development—the motion picture. The questionnaire includes the following significant features: what films are schools now using—what other visual aids are schools using in addition to the motion picture and to what extent—what administrative provisions are made for the use of visual aids—what teaching techniques are followed—what support can be expected from teacher training institutions within the state—what provisions are made for keeping in touch with current developments in the field—what are their specific problems and what kind of films are recommended as most needed for school use?

It is anticipated that the questionnaire will serve to accomplish the following objectives: (1) Provide practical information for schools contemplating the use of visual aids. (2) Indicate the difficulties which schools are now experiencing in their visual education program in order that ways for overcoming these obstacles may be suggested. (3) Make available to motion picture producers a list of the films that equipment owners want to use in their schools so that they may be guided in their future production programs. Copies of the final report will be supplied on requests sent to the Victor Animatograph Corporation, Davenport, Iowa.

Note the very large periodical being used without mutilation.

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Audio-Visual Education
Theme of Texas Conference

By ARTHUR L. MABERRY
Deputy State Superintendent, District No. 12, Tyler, Texas

AUDIO-visual education started taking on real life in the State Department of Education during the spring and summer of 1937. It started gaining impetus soon after the New Orleans' meeting of the Department of Visual Instruction of the National Education Association. The programs there inspired the State Superintendent, Dr. L. A. Woods, to start a movement for the purpose of increasing the use of these modern teaching tools.

The first actual results came to light during the summer, when three of the deputy state superintendents, Miss Madge Stanford, Mr. Ozelle Murdock, and Mr. Arthur L. Maberry, selected the subject of audio-visual education to work on in a curriculum installation course given in the University of Texas. Miss Stanford and Mr. Murdock were students in the course, while the third member of the trio was working purely because of his interest in curriculum revision and audio-visual education.

This committee classified all of the visual aids in the University of Texas visual instruction library according to the five core areas of the state's new tentative course of study, made up a bibliography of free and useful materials, secured an agreement with the University whereby a twenty-five dollar group rental fee per school would pay for the use of all 16mm. films in the University library, with the aid of Dr. L. A. Woods, state superintendent, acquired for salary aid schools a sum of five dollars per teacher, but not to exceed thirty-five dollars per school, to b e used for purchasing visual aids equipment and supplies, and secured provision that the state score card for standardized schools, for the first time, allow fifteen points of credit for schools having and using audio-visual aids in teaching.

Mr. J. Fred Horn, Supervisor of school plants, made a study of radio education in Texas during the winter and spring of 1937. This interest and work led to two radio courses at Southern Methodist University and The University of Texas, conducted by Mr. Ben H. Darrow, in the summer of that same year. Practically all of the twenty-four supervisory districts now have at least one radio program each week; District Number Twelve has three radio programs each week. These are thirty minute programs conducted by the school pupils and made up of music, new flashes, short talks, short dramas, and reports of interesting Parent Teacher Association work being done in the community. The programs are sponsored by the State Department of Education under the direction of the deputy state superintendents.

The interest in audio-visual education has been growing rapidly, so rapidly that it was decided to make the central theme of the fourth Annual Conference of School Administrators a study of audio-visual education. The Conference was held January 6 and 7, 1938. A splendid program was planned by the first assistant state superintendent, Dr. Jeremiah

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Rhodes, who never saw it carried out because of his death at seven o'clock on the morning of January 6. His work had been done so efficiently and his guiding spirit was felt so greatly throughout the program that the meeting was more successful than any had expected. There were at least one thousand Texas school administrators in attendance. These administrators considered carefully all of the instructive lectures and demonstrations that were given. The attendance at each meeting of the conference was large.

Practically every phase of audio-visual education was well demonstrated and adequately discussed. Mr. E. C. Dent, Director of Educational Department, RCA Manufacturing Company, reviewed the "Recent Developments in the Use of Visual Aids to Instruction." Mr. V. C. Arnspiger, Erpi Picture Consultants, gave two addresses, entitled "Introducing the Film in the Curriculum" and "Using the Film on the High School Level." Sound-film demonstrations by Prin. J. J. Vincent, Beaumont, Texas, and Mr. Arnspiger, showed how this valuable teaching aid can be used from the first grade through the most technical higher educational courses. Slides and film strips were also demonstrated as teaching aids, and the possibilities for teacher-made slides were discussed. Mr. Walter S. Bell, Board of Education, Atlanta, Georgia, gave a resumé of the "Problems of Presentation and Distribution of Filmslides." Mr. L. L. Perry, Director of

(Continued on page 63)

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SCHOOL DEPARTMENT

Conducted by Wilber Emmert
Director Visual Education, State Teachers College, Indiana, Pa.

A Model-Making Laboratory

By D. PAUL SMAY
Art Instructor, High School, Indiana, Pa.

WITHOUT a doubt the filling-station type of education is well on its way out. The school, wherein the degree of one's success is dependent upon one's capacity to absorb facts, is definitely out of tune with the demands of the world today. The raw and unsoftened question that falls over our graduates like a shower of cold water is, "What can you do?" Sound education to meet this need must continue to place increased emphasis upon supplementing "factual and principle" education with expressive activities of some type. This philosophy is being developed in several fields of education and has been christened many different names such as "expressionism," "integrated activities," etc. One such experiment in this direction of educational development was the establishment of a *craft room laboratory*.

This original craftroom was established in a janitorial stock room without access to outside light and entirely without any equipment, seats, tables or cupboards. Nothing could have been more primitive than our original set-up—an empty room with four walls. Hardly any school district could boast of less. Before the end of the term the room had grown into a laboratory work shop with tables, bins, shelves, tools and supplies adequate to the construction of projects similar to those to be described. Similar results are within the possible reach of most schools with an alert teacher in charge.

Unquestionably the primal purpose of such a work room was to include in the school program a definite place wherein expression in creative activity was a definite responsibility of both the students and the teacher. Previous to the existence of the laboratory the model-making done by the students to illustrate or develop a unit of work was necessarily done at home, with insufficient tools, equipment, and materials. This inefficiency in the work made it unsuited to all, excepting the very persistent and extremely hard working few. The craft room, by providing the tools, equipment, and materials, made the results achieved more in proportion with the efforts put forth. The creative atmosphere generated by dozens of students working on many different projects was an added incentive to the construction. The help and encouragement of an instructor produces the needed push that prevents a stalling on some of the rough spots. In fact, the presence of such a room and such work was almost symbolic of the inclusion of life's problems into the present-day school.

Several objectives in this experiment were set up and maintained to attempt at least to keep the progress in the right direction. In the first place, the laboratory's existence was based upon the philosophy *"learning is doing."* Children soon sensed the challenge of the laboratory. Their courses in literature, mathematics, science, history, geography, dramatics health, music, and art began to pay "dividends." The instructors in those diverse fields could point to facts and principles used in the craft room work for which they were responsible. The vitality of their teaching and personality was also directly reflected in the work accomplished. This was an ideal opportunity for the teachers to gain a "kinetic quotient" in the value of their instruction.

Appreciation was decided upon as a second objective. This is a wide and indefinite term. But so was the objective wide and almost indefinite. To some students in the upper brackets of mental strength, the inter-relationship of design, structure, and materials seemed to form the basis upon which their work became an active part of their lives. From that upper strata various appreciation levels filtered down to those whose greatest joy lay largely in the manipulative stages of handwork.

The last, but by no means least, objective was to keep the work, the equipment, and the materials defin-

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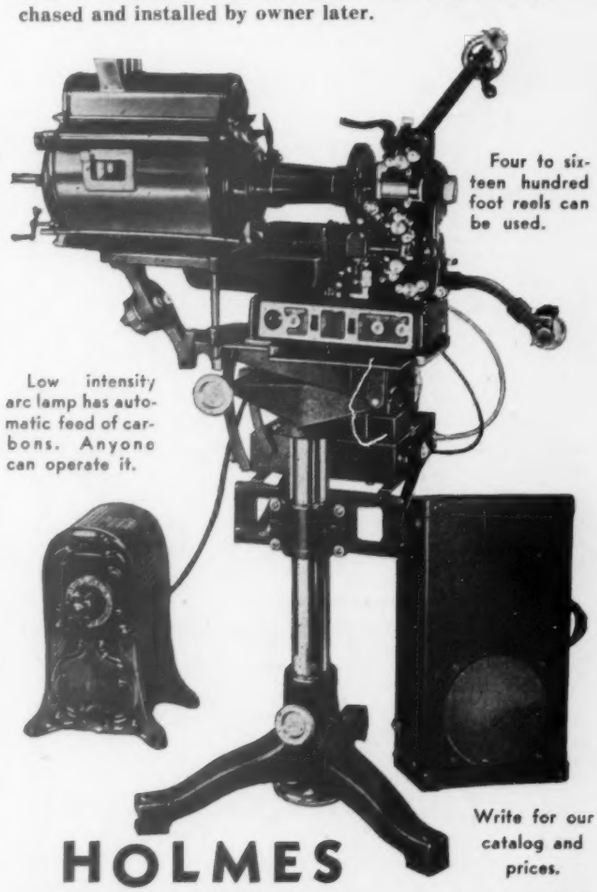

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VISUAL SCIENCES — Suffern, N.Y.

itely *non-technical*. The hope behind the whole laboratory setup was that it would merely become a launching place for continuous efforts in the same lines of work. No effort was made to teach skills that would "rust" from lack of continual use. Expensive and hard to get materials would be a crippling barrier to the future work of the students. The equipment chosen and the materials used were well within the means and access of everyone.

Space, equipment, and supplies are the three "spectres" that haunt every new activity in school life. As with any educational effort, cheerful, light, and airy surroundings are conducive to better work. However, the work itself is easily motivated and the "inner-glow" generated by creative efforts can convert a dungeon into a drawing room. Also, the less "finish" on a room, the more and more its care can be relegated to secondary importance as regards the work in progress.

The equipment needed will delight a budget-maker's heart. Clay, sawdust, rags, sticks of wood, twigs, crates, pasteboard, shoe boxes, razor blades, yard sticks, tin cans, twine, and wire are as free as the air and are obtainable in every district. Hammers, paint brushes are obtainable at any five and ten cent store. This quality is sufficiently good for the work. saws, pliers, drills, putty, knives, screw drivers, and Equipment for a class of thirty-six amounts to approximately fifteen dollars. Two machines that help tremendously are a used sewing machine and an electric jig saw. Five dollars seems to be the standard price for a "sub-marginal" sewing machine. A first-class jig saw, equipped with a motor, approximates twenty-five dollars. One-quarter inch ply wood in four by eight foot sheets forms the tops of most of the tables. The cost is approximately one and a half dollars for such a sheet. The expense involved in the under rigging of the table is about one dollar. Such a table is sufficiently large to accommodate a group of eight persons with ease. To stock our "larder" we may purchase two sacks of plaster of Paris, twenty-five pounds of flour, five pounds of flake glue, one sack of lime, one sack of cement, one hundred pounds of sand, dry colors, linseed oil, shellac, alcohol, varnish, turpentine, and bronze powders. These materials just about equip us to rebuild the glories of the ancient world and to produce new wonders yet to come.

The work of the original art room group penetrated the past to the time of the Swiss lake dwellers. They recreated a lake village in miniature, perched on a Lilliputian lake bed with piles made of 1/4" twigs pushing up through a wind-tossed surface, made of rumpled cellophane. The Stonehenge arose again under the skillful fingers of three fifteen-year old "giants." The stone sarcophagus of Astarte, high priest of Assyria, was reborn in white plaster, blackened to rep-

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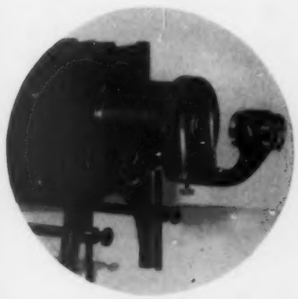

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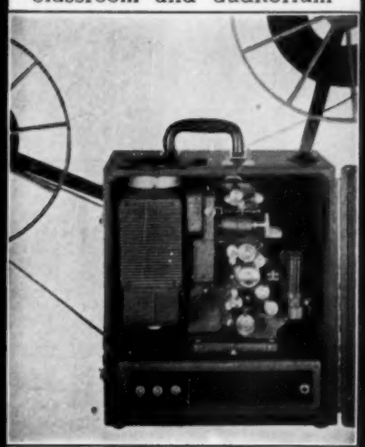

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resent the original basalt, despite the curses that were so carefully transcribed from the original. We can watch, unheeded and unseen while tiny Egyptian butchers, bakers, brewers, carpenters, and cattle drovers continue their respective duties in the timeless history of Egypt. The five rows of sweating oarsmen on the Grecian galley still labor for us on the Aegean that has shrunk to a section of beaver board with plastic waves. Time marches swiftly up through history in the craft room to the present where our own city beautifies herself in plaster, paint, and stone, with parks, memorials, bridges, stairways, airports, highways, and public buildings. Modern homes, built by embryonic "Frank Lloyd Wrights" set a goal and establish a need for future civic growth.

The craft room "elbowed" its way into the "indispensable" class in the school with its contribution to the school's efforts in dramatics. Our aims were not one bit desecrated when a Moroccan fortress was constructed to fill the stage for the Foreign Legion to storm. Aeneas and Dido had their tragic lives reinforced with a Greek temple that was largely wire, muslin, and sticks. The glistening helmets, shields, and breast plates of the soldiers had a used paper towel basis to support the metal enameling. A section of the Luxemburg palace helps us to live with the Three Musketeers for three performances. The sparkling diamonds in Cinderella's tiara, rings, and bracelets, lose their magic when we remember that their base was epsom salts. Like the tail of a comet the craft room followed the "imaginings" of the dramatics department from the past through the present and into the mystics of the future. The glitter of the stage sets began to challenge the sterling silent products in the craft room. The battle is not over.

There need be no searching for the "outcomes" of the craft room experiment. *Socially* the contribution was in forcing teamwork on projects. Leaders, lieutenants, specialists, cooperations, conflicts, disappointments and joys—all come from the group work. Definite concrete efforts in future architectural, and structural needs of the community will bear definite concrete results. *Historically* the experiences break down the concept of the history book as a telescope to view the past. Rather the effort has been an experience of living with those folks of the ages. *Geographically* the "worm's eye" scope of our own vision increases until "Jehovah-like" we can look down from the

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heights onto tiny railroads, docks, ships, factories, water falls, canals, etc. *Personally* the joy and satisfaction of doing and creating is an ever increasing hunger that makes for a better and fuller life.

News and Notes

(Concluded on page 57)

Division of Information and Publications, Georgia State Department of Education, and Mr. H. R. Richie of University of Georgia, also participated in the program.

The possibilities of the use of the motion picture camera in the school were also discussed and ably demonstrated. Other speakers and their topics were: Mr. T. H. Shelby, Director of Extension Division, University of Texas—"Radio Services Available to Texas Schools;" Mr. R. M. White, Abilene, Texas—"Acoustics and Audio-Visual Education;" Mr. George H. Wells, Principal, Austin High School—"Use of Inter-School Hook-up."

"Ten Best" Films of 1937

The Life of Emile Zola, Warner Brothers' film starring Paul Muni, has been selected as the best film of 1937 by the newspaper and magazine film editors and critics of the country canvassed in the *Film Daily's* annual poll. The nine other "bests" were: *The Good Earth* (MGM) *Captains Courageous* (MGM), *Lost Horizon* (Columbia), *A Star Is Born* (UA), *Romeo and Juliet* (MGM), *Stage Door* (RKO), *Dead End* (UA), *Winterset* (RKO), *The Awful Truth* (Columbia).

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Current Film Releases

Film on Nursing Profession

A vocational motion picture which successfully serves a double purpose has been created by the Harmon Foundation Division of Visual Experiment in *Nurses in the Making.* This two-reel survey of a modern nursing education, made in cooperation with the New York Hospital School of Nursing and other agencies, is being widely used not only by hospitals, schools of nursing, and public health agencies, but also by high schools for vocational guidance.

The major portion of the film portrays highlights of a modern nursing curriculum. Without attempting to show procedures in detail, it suggests by brief scenes the scope and content of such a program. Glimpses of the preliminary aspects of the student's education are presented, followed by scenes showing the student in the medical and surgical pavilions of the hospital, where she becomes familiar with the many services and carries out, under careful supervision, the techniques she has learned. The emphasis on the nurse as a teacher is indicated by scenes of the student helping mothers to learn the proper care of a baby and assisting sick children in their play. Her two months' affiliation with a visiting nurse agency helps her to apply hospital techniques in the home, and a final four months in the care of patients with mental and personality disorders rounds out her basic professional education. The film does not neglect other phases of

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the student's life. The careful supervision of her own health is shown, and the provision made by the school for her social and recreational activities. As a whole the film creates a real understanding of the nurse's place in the modern community and of the necessity for a thorough comprehensive preparation to fill it.

Nurses in the Making is a sixteen millimeter silent film, available on a rental basis from the Harmon Foundation, New York City. Systems of public instruction and other qualified organizations may also secure prints of the picture for their own use on a lifetime lease basis. The film is distributed with "Suggestions for Use" prepared in cooperation with national nursing organizations, which include background material and reading lists on nursing, suggestions for musical accompaniment, and helps in planning programs. Phonograph records to supply the accompaniment may be rented with the film.

Additions to Garrison Library

Garrison Film Distributors, New York City, have acquired exclusive rights to the distribution of *Ethiopia today*, a silent three-reel short subject, which was produced by Dr. Kurt Wiese in Ethiopia and is an authentic record of events since this country was proclaimed Italy's "New Empire." The film was especially edited for integration with the school curriculum and is now being used by the New York Public School System.

Also on the current schedule of releases by Garrison for classroom use is *America's Disinherited*, a real-

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life story of the southern share-cropper and his unavailing struggles against poverty. This is a three-reel subject with commentary by Dr. John Haynes Holmes.

Lenten and New Subjects from Ideal

Ideal Pictures Corporation, Chicago, have just issued their 1938 Lenten Bulletin of Religious Motion Pictures in 16mm sound and silent and 35mm silent. Among the new religious releases in 16mm sound are *Brother Francis* (7 reels), *St. Anthony of Padua* (9 reels), *Life of Christ* (8 reels), and *Christus* (7 reels). This catalog should provide a wide selection to churches planning their Lenten programs.

Supplement No. 2 of their regular motion picture catalog, listing new subjects which have been added to their library, announces price reduction on many of their rental features and shorts. Ideal also announce that they have available all of the pictures released by Castle Films, Inc.

Panay Bombing in 16mm.

The famous newsreel, Norman Alley's *Bombing of U. S. S. Panay,* is now offered for sale by Castle Films, in the same five versions as all Castle releases—16mm silent (100 feet and 360 feet) and sound (350 feet), 8mm. silent (50 feet and 180 feet). Announcement is also made of *The Winner,* latest addition to the series of Sport Parades, showing the champions of the year.

Short Subjects Edited from Features

Paramount Pictures have produced two new short subjects for educational and non-theatrical consumption from their features, *High, Wide and Handsome* and *Wells Fargo.* From the former, a two-reel film has been made, entitled *Men and Oil,* portraying the early development of the oil industry in America and the laying of the first pipe-lines. *Wheels of Empire,* a one-reel production edited from *Wells Fargo,* tells the story of transportation and communication. Both films are available from Films, Incorporated, in 16mm. with orchestral score and narrator's voice.

Classroom Reading Projects on Foreign Films

The International Film Bureau of Chicago announces the publication of portions of the dialog of *La Kermesse Heroique* for classroom study before showings of the film. This reading project has been prepared by Sara Thompson, Teacher of French in the Oak Park River and Forest Township High School, Oak Park, Illinois. It contains explanations and marginal vocabulary prepared with the needs of third semester French students in mind, and is intended for reading before the film and dramatization by students after the film has been shown several times. The Bureau also has available dialog reading projects based on *Singende Jugend* and *Emil Und Die Detektive.*

The International Film Bureau announces the national release of *The Making of a King* (*Der Alte un Der Junge Koenig*) in 16mm sound. This picture, starring Emil Jannings in the role of the father of Frederick the Great, has been appraised by members of the history and German departments of the University of Chicago as historically accurate in story and detail.

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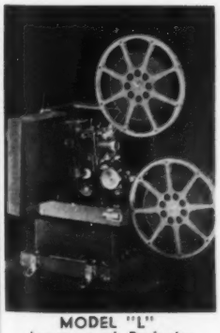

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Pictures for the Social Studies

From Informative Classroom Picture Association, Grand Rapids, Michigan, comes news of a new series of pictures for use in the teaching of Social Sciences. These are black and white line drawings 8½" by 11" printed on bristol board, each unit consisting of some twenty large plates. The series when completed will include ten units, which correspond to the units of activity taught in most schools. The titles are: "Home and Community Life," "Clothing and Textiles," "Pioneer Days," "Life in Colonial America," "Knighthood—Life in Mediaeval Times," "Transportation," "Christmas in Many Lands," "The Farm," "Indian Life," and "Modern Primitive Peoples." Three of the units are already completed and in use, and the others are in progress. Concise text material, a bibliography, and suggested activities accompany each unit.

The pictures have been organized as units around natural centers of child interest with the idea of providing clear, forceful, informative pictures that explain and clarify the subject and stimulate pupil research and activity. The legend which accompanies each picture tells its own interesting story and answers the questions which the details of the picture stimulate. It has been the aim of the editors to produce pictures that teach, that are not merely pretty. After considerable thought and experimentation it was decided that line drawing, when reproduced in sharp black and white could best accomplish this end. In such pictures the child's attention is centered upon the informative aspects of the subject and is not distracted by the mere brilliance of color which, in color pictures, sometimes takes predominence over the information contained in the picture.

Spencer Lens to Build New Plant

Expecting ultimately to double its present production schedule and number of employes, the Spencer Lens Company of Buffalo, New York, completed negotiations for the purchase of 25 acres at Cheektowaga, a Buffalo suburb. The expansion plan, as outlined by Burton H. Witherspoon, vice-president and general manager of the company, will mean the construction soon on the new property of a production unit, to be followed during a period of years by the building of other units as increased business warrants.

Employment of an additional 100 men during the last year, has warranted this expansion program, Mr. Witherspoon said, stressing the fact that his concern contemplates no immediate withdrawal from its present plant. Units on the Cheektowaga property will be constructed gradually, the production schedule being increased correspondingly as additional facilities become available.

Central Camera Products

The new Trojan Reflectors have been introduced by Central Camera to provide efficient lighting units at moderate cost. Like the Realite lighting equipment after which it is patterned, the Trojan is equipped with the new patented lock construction—one push, one pull, and your stand is set properly at any height. Not as heavily constructed as the Realite, it is steadily and durably constructed of cold rolled steel, with polished aluminum reflectors, acid etched inside. Priced at only $3.95 and up.

From the workshops of the Central Camera Company, 230 South Wabash Avenue, Chicago, Illinois, comes another photographic aid—the new Royal Tripod. Made of all metal, the two sections adjust at any height by a single quarter turn of an ingenious ring. It is strong enough to support all still and movie cameras and can be furnished with its twin newcomer, the Royal Tilting Head for panoraming and tilting. Both operations are controlled by a single lever.

Both products are described in the Central bargain book which is available for free distribution.

DeVry Centralized Control System

In the photograph may be seen Monsignore M. Klasen seated before the "Console" of the DeVry System, addressing the classes of St. Gregory School, Chicago, which has recently purchased a centralized central unit linking all classrooms with the principl's office.

New Catalog of Film Accessories

Neumade Products Incorporated, New York City, announces the issue of a new 1938 catalogue, completely revised and fully illustrated covering all types of film editing, laboratory and film storage equipment that are manufactured by this film.

This concern, since 1916 manufacturing products for 35mm., has recently gone into the 16mm. field. Of particular import are the Neumade Film Storage Cabinets which offer protection for valuable 16mm. films. All those who wish to acquaint themselves with the latest methods of handling, editing and storing films will want a copy of this interesting new catalogue.

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THE FILM ESTIMATES

Being the Combined Judgments of a National Committee on Current Theatrical Films
(A) Discriminating Adults (Y) Youth (C) Children
Date of mailing on weekly service is shown on each film.
(The Film Estimates, in whole or in part, may be reprinted only by special arrangement with The Educational Screen)

Amphitryon (French-Rhythmic dialog-English titles) Aristophanes made into a modern sophisticated whimsy. Hilarious, bawdy burlesque of Jupiter and Mercury parachuting to Earth to seduce two wives of absent soldiers. Thoroughly laughable amorous farce-comedy in pseudo-classic style. 1-11-37
(A) **Very good of kind** (Y) and (C) No

Boy of the Streets (Jackie Cooper) (Monogram) Social evils of slum life vividly shown. Jackie—with marcel!—smart benighted hero, taught by worthless father that "only saps work," lies, cheats, steals, fights too amusingly. Intended ethical values lost. Joining Navy cures all. 2-1-38
(A) **Fair** (Y) **Perhaps** (C) **Unwholesome**

Buccaneer, The (March, Gaal, Tamiroff, Sothern, Grahame) (Para) DeMille masterpiece. Romantic melodrama, brilliantly directed, beautifully set, acted and photographed. Inflates minor history to epic proportions, glorifies rascality, decorates and distorts for maximum glamor. Thrilling entertainment, not "education." 1-25-38
(A) and (Y) **Excellent of kind** (C) No

Charlie Chan at Monte Carlo (Oland, Luke, Huber, Virginia Field) (Fox) Fairly good Chan mystery, despite overcomplexity and unpleasant aspects of plot and some faulty direction. Keye Luke still tries too hard. Comedy situations amusing, with Huber especially good in role of French police chief. 1-25-38
(A) Good of kind (C) No

Club de Femmes (Danielle Darrieux) (French dialog, Eng. titles) Highly sophisticated comedy concerned with sex impulses of girls isolated in elaborate club-home. Real artistry in subtle characterizations, dialog, acting, direction. Dramatic values high. Subject-matter too continental for most American taste. 2-1-38
(A) **Notable** (Y) and (C) By no means

Exiled to Shanghai (Wallace Ford, June Travis) (Republic) Senseless title for hash of cameraman adventures in Spain and America built round phony promotion of faked television. Artificial thrills, overworked coincidence, little logic, and much mere silliness. 1-18-38
(A) Stupid (Y) Hardly (C) No

45 Fathers (Jane Withers, Thos. Beck) (Fox) Jane still impossibly mature and aggressive in arranging affairs of her elders, but her capers and absurd proceedings, with slapstick, ventriloquism and a mischievous monkey as ingredients, are hilariously funny as she extricates hero from designs of gold digger. 2-8-38
(A) (Y) and (C) **Amusing**

Glamorous Night (Otto Kruger, Mary Ellis) (Republic) English production. Mythical kingdom—musical romance about a beloved King, a dictator, and a gypsy queen who saves the monarchy. Plenty of action, picturesque backgrounds, but sound and photo-technique not the best. 2-8-38
(A) Hardly (Y) Fair (C) Little interest

Happy Landing (Sonja Henie, Don Ameche) (Fox) European flight a la Harry Richman. Crude, cheap romance by sappy villain, bad taste comedy, banal singing, tortured music. Sonja's skating wonderful as ever but flimsy story and half-inch eyelashes do not help. 2-1-38
(A) **Feeble** (Y) **Not the best** (C) No

Hollywood Hotel (Dick Powell, Lane Sisters, et al) (Warner) Luxurious slapstick and horseplay in gorgeous settings and raucous noise. Visual and aural pandemonium glorifying Hollywood, radio and Luella Parsons. Hectic music, sycophantic dialog, silly action and unconscious burlesque. Acting undistinguished. 1-18-38
(A) Depends on taste (Y) (C) Amus. but dbtfl. val.

Hurricane (Jon Hall, Dorothy Lamour, C. Aubrey Smith) (U. A.) Monumental achievement in mechanical technique overwhelms picture, both strength and weakness. Full of improbability, even absurdity, but seeks thrill at all costs and succeeds. A masterpiece of its kind, notable for both direction and cast. 1-18-38
(A) **Extraordinary** (Y) Thrilling (C) No

In Old Chicago (Alice Brady, Ameche, Power) (Fox) O'Leary family glorified in faintly historical, seething melodrama of old Chicago. Real character values and amusing grotesques in first half. Rest becomes expert chaos of tremendous "effects," violent thrills, deafening pandemonium. More colossal than important. 2-1-38
(A) and (Y) **Very good of kind** (C) No

Invisible Menace, The (Karloff, Marie Wilson) (Warner) Bloody doings in an army post, with atmospheric effects calculated to heighten suspense and mystery in killing of army officer. Comedy provided by a rookie and his bride, smuggled into camp. Suspenseful, but marred by brutalities and confusion in plot. 1-25-38
(A) Perhaps (Y) Not the best (C) No

Jury's Secret, The (Kent Taylor, Fay Wray) (Univ) Circumstantial evidence tries innocent man for murder while killer sits on jury. His one vote for acquittal causing deadlock, he is smugly content, but fiancee, stumbling on evidence of his guilt, persuades him to confess. Very incredible, sensational, suspenseful. 2-1-38
(A) Hardly (Y) and (C) No

Lady Behave (Sally Eilers, Neil Hamilton) (Republic) Heroine's married kid sister does drunken Mardi Gras marriage with rich married playboy. To save her from crazy mess, heroine poses as wife. Absurd complications with various intrigues and divorces, two impossible children, attempted swindle, etc. 1-25-38
(A) Absurd (Y) and (C) No

Love Is a Headache (Gladys George, Rooney, Tone) (MGM) Imitating "Wise Girl," two impossible kids are orphaned and saved by hero and heroine. Good intentions nearly wrecked by well-meaning but dumb publicity man. Much supposed comedy more painful than funny. Waste of George and Tone. 2-1-38
(A) Dull (Y) Poor (C) No

Mannequin (Joan Crawford, Spencer Tracy) (MGM) Hard-working heroine escapes slum home by marrying obvious good-for-nothing. Ardent love, then dreary disillusion until rich, rough, big-hearted hero brings second marriage. Good acting, but too much of story is dismal, improbable and false. 2-8-38
(A) Perhaps (Y) and (C) No

Marihuana (Unknown cast) (Roadshow Films, Inc) Cheap thriller, cheaply produced, paraded as education. Crudely told and acted story of innocent heroine and young friends—soft drinks, liquor, marihuana, iliegitimate baby, final reform, etc. Sensational lobby publicity now needed for 1936 picture. 1-18-38
(A) Trash (Y) and (C) No

Night Club Scandal (John Barrymore, Lynne Overman) (Para) To start, clever club man kills faithless wife and frames lover. Cleverer newspaperman—expertly comic role by Overman—follows tangled clues and solves all. Deft mixture of fun and suspense to the end. 2-1-38
(A) Good of kind (Y) Mature (C) No

Non-Stop New York (John Loder, Ann Lee) (Gau-Brit) English chorus girl, penniless in New York, is only witness to gang murder. Then long struggle in London, hectic trip on transatlantic plane. She outwits gang and saves innocent man from death-sentence. Villain melodrama. 2-1-38
(A) Depends on taste (Y) Hardly (C) No

Paid to Dance (Don Terry, Jacqueline Wells) (Univ) Sensational expose of dance-hall racket cheapened by over-emphasis on murder and violence. Shows girls bought and sold, held in virtual slavery by employers, till racket smashed by stalwart Government agent in climax exposing and "disposing" of big boss of ring. 1-25-38
(A) Hardly (Y) and (C) No

Paradise for Three (Frank Morgan, Rob't Young) (MGM) Hilarious fun by expert cast in merry mistaken-identity story of rich and poor "contest winners" on Alpine vacation. Mary Astor's small role as cheap seductress is needless smudge on fine farce-comedy. Morgan does notable role. 2-8-38
(A) **Amusing** (Y) and (C) Mostly Amusing

Penitentiary (Walter Connolly, John Howard) (Columbia) Innocent hero—street girl—night club—insult—manslaughter—prison. Then extended and convincing portrayal of grim prison life. Notable role by Connolly as warden. Otherwise a depressing jumble of weak story, dull romance and dramatic falsities. 1-25-38
(A) Feeble (Y) and (C) No

Portia on Trial (Frieda Inescort, Walter Abel) (Republic) Well-acted and produced, but sordid, unpleasant, unconvincing melodrama a la "Madame X," with betrayal and murder chief ingredients. Only the excellent performances of Inescort and Abel give it any semblance of reality. They deserve better. 1-11-37
(A) Hardly (Y) and (C) Certainly not

Radio City Revels (Burns, Oakie, Berle, et al) (RKO) Radio "plugs" for movies and now movie reciprocates — with little benefit to either. Absurd hash of "music," dancing, horseplay, mostly loud and stupid, with plot or talent scarcely discernible. Hectic attempts to make physical exertion funny. 2-8-38
(A) Stupid (Y) Perhaps (C) Prob. Amusing

Shadow, The (Rita Hayworth, Chas. Quigley) (Columbia) Murder mystery crudely done in trappings of small-time circus troupe. Black-robed shadow shoots poison darts in the dark till hero brings prosaic solution. Artificial suspense, mediocre acting, clumsy narrative. 2-8-38
(A) Poor (Y) No (C) No

She Married an Artist (John Boles, Luli Deste) (Col) Light, breezy, mature farce about stormy marriage beset by crazy misunderstandings and situations—complicated by husband's pretty model—leading to separation. But blustery old housekeeper engineers reconciliation and happy ending. 1-18-38
(A) Fair of kind (Y) Doubtful values (C) No

She's Got Everything (Ann Sothern, Gene Raymond) (RKO) Efforts of heroine's creditors to marry her off to rich husband provide slight, uneven comedy of romantic complications. Slow-moving, uninspired dialog, and not enough story for assorted comedians in cast. Antics of Broderick and Victor Moore amusing. 1-25-38
(A) Only Fair (Y) Rather amus. (C) Little Int.

Some Blondes are Dangerous (Noah Beery, Jr., Nan Grey) (Univ.) Commonplace film about pugilist hero, all brawn, no brain, who falls for and marries brazen, cheating chorus girl. Finally awaking to her double dealing he turns again to decent, patiently waiting little heroine. Endless shots of ring fighting. 1-11-37
(A) Poor (Y) No value (C) No

Spy Ring (Wm. Hall, Jane Wyman) (Univ.) (Inventor of silly "improvement" to army rapid-fire gun is killed by blonde spy, his pal to carry on work. Polo and romance absorb hero till spy theme is resumed for climax. 1-25-38
(A) Mediocre (Y) Perhaps (C) Hardly

Thrill of a Lifetime (Betty Grable, Leif Erikson) (Para) Airy and lively musical with youthful cast engaging in song, dance and romance. Slight plot, concerning hero's efforts to sell play portraying life at his camp, serves as a basis for specialty and ensemble acts. Some amusing bits. 1-11-37
(A) Mostly inane (Y) Fair (C) Perhaps

Troop Ship (Leslie Banks, Flora Robson) (U. A.) Life of British Tommy, on board troop ship vividly and humanly portrayed, with its ups and downs, glowing hopes and poignant disappointments. Ample comedy in contrasting characters living under rigid discipline, for "King and Country." 1-18-38
(A) **Novel** (Y) Good of kind (C) Hardly

Viennese Nightingale (Martha Eggerth, Leo Slazak) (German with English titles) (Casino Films) Charming heroine, obsessed with stage ambition, climbs from laundry girl to prima donna through amusing, distressing and very human adventures. Well made little plot, splendidly sung and acted. Notably good sound. 1-18-38
(A) **Very good of kind** (Y) Perhaps (C) No

Wise Girl (Miriam Hopkins, Ray Milland) (RKO) Decidedly original whimsical comedy suffers from too much inconsistency, burlesque and silliness. Rich heroine rescues two little orphan girls held by the half-cracked artist hero in a phony Greenwich Village. Unique but uneven interest. 1-18-38
(A) Hardly (Y) Fairly good (C) No

Women in Prison (Wyn Cahoon) (Columbia) Pretentious thriller of hidden loot and gangsters. In grewsome accident they "frame" heroine who gets 10 years in prison where her mother is warden! Jailbreak—and guns keep going till gang chief dies and all is solved. 2-8-38
(A) Mediocre (Y) and (C) No

Young Pushkin (Russian-English titles) (Lenfilm) Against lovely Tsarskoe Selo backgrounds, the 1815 school days of great poet glorified in realistic but undramatic narrative. Boy appealing, but gnome-like in look and weird movements. Much reading of poetry. Tempo slow, humor heavy. 2-8-38
(A) Hardly (Y) and (C) No interest

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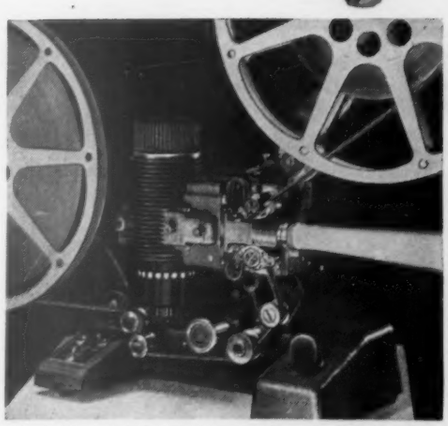

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Please send me full information on ( ) Filmosound Projectors, ( ) Silent Filmo Projectors, ( ) Bell & Howell Payment Plans, ( ) Silent films for school use, ( ) Sound films for school use.

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FAR SAFER

EVEN if you have an enclosing booth for 35-millimeter projection, film of the "safety" type is far safer to handle than film with a nitrate base. It involves even less hazard than so much newsprint paper. In ordering 35-millimeter prints, specify Eastman Safety Film, and look for the words *Eastman . . . Safety . . . Kodak* throughout the transparent margin. Eastman Kodak Company, Rochester, N.Y. (J. E. Brulatour, Inc., Distributors, Fort Lee, Chicago, Hollywood.)

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